DOCUMENT RESUME

ED 176 508 EC 120 603

AUTHOR	Mallis, Jackie; Heinemann, Alison
TITLE	Star Power: Providing for the Gifted & Talented. Module 9. Programs for the Gifted/Talented.
INSTITUTION	Education Service Center Region 13, Austin, Tex.
PUB DATE	78
NOTE	121p.; Due to copyright restrictions the appendixes are not included in the series; Best Available Copy; For related information, see EC 120 594-604
AVAILABLE FROM	Education Service Center, Region XIII, 7703 North Lamar Boulevard, Austin, Texas 78752 ($78.00 per set; $10.00)
EDRS PRICE	MF01/PC05 Plus Postage.
DESCRIPTORS	Elementary Secondary Education; *Gifted; *Inservice Education; Inservice Teacher Education; *Program Development; *Program Planning; Resource Guides; *Talented Students; *Teacher Evaluation; Teacher Workshops

ABSTRACT

The document presents Module 9, programs for the gifted/talented, of the Star Power modules developed for school personnel who have an interest in or a need to explore the area of gifted and talented education. It is explained in an introductory section that the modules can be used for independent study, for small group interaction, or for a large group inservice program. The document is divided into six sections covering the following procedures: laying the foundation (which includes becoming familiar with the reasons for making special provisions for the gifted/talented; surveying the local situation (which involves understanding the steps involved in planning a gifted/talented program); planning the program (which involves realizing the procedures needed to establish and implement an effective program); selecting teachers and planning staff development (which involves discovering the traits which are shared by successful teachers of the gifted/talented); evaluating the program; and funding the program. Each section reports enabling objectives, rationale, activities, preassessment questions, and preassessment evaluation procedures. A final note on postassessment is given. (SBH)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED176508

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
NATIONAL INSTITUTE OF EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY

star power

providing for the gifted & talented

MODULE 9

PROGRAMS FOR THE GIFTED/TALENTED

by

Jackie Mallis and Alison Heinemann

EDUCATION SERVICE CENTER, REGION XIII

7703 North Lamar

Austin, Texas 78752

1978

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

Education Service Center, Region XIII

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

EC 120603

Executive Director	Dr. Joe Parks
Director, Instructional Services Division	Donroy Hafner
Coordinator, Curriculum and Instruction	Laura Williams
Project Manager	Jackie Mallis
Cover Designer	Martha Bell

EDUCATION SERVICE CENTER, REGION XIII

Austin, Texas

A C K N O W L E D G M E N T S

We are grateful to the following individuals for their input into the preparation and revision of materials for this project:

* for in-house review and critiques

Joyce Caulk, Consultant - Instructional Services, also member of Gifted & Talented Task Force

Joanna Chambers, Information Specialist, Bilingual Resource Center - Program Development

Dr. Bill Davidson, Consultant for Gifted and Talented - Instructional Services, also member of Gifted & Talented Task Force

Dr. Hal De Shong, Consultant - Instructional Services, also member of Gifted & Talented Task Force

Pamela Harper, Editor - Program Development

Maxine Lain, Consultant - Instructional Services

Susan Lee, Writer/Developer - Instructional Services

Scottie Littleton, Consultant for Crime Prevention and Drug Education, also member of Gifted and Talented Task Force

Cecilia Sessom, Writer/Developer - Instructional Services

Maggie Sloan, Coordinator/Pupil Appraisal - Instructional Services

Pam Smith, Consultant - Instructional Services

Dr. Ben Wallace, Coordinator/Special Education

Laura Williams, Coordinator/Curriculum and Instruction - Instructional Services, also member of Gifted & Talented Task Force

* for review and critiques by members of the Gifted & Talented Advisory Committee

Leslie Cohen, Elementary Coordinator/Gifted Projects, Austin Independent School District

Terry Masters, Program Director, Women's Equality in Education, and former Program Director, Talented Youth Project, Austin

Mary Ralph, Curriculum Director, Schertz-Cibolo-Universal City Independent School District

* for participation in pilot testing and extended field testing of modules

GEORGETOWN INDEPENDENT SCHOOL DISTRICT

Melinda Eidson, Teacher - Primary
Merritt Romans, Principal - Primary

Mary Frances Radius, Counselor - Elementary

Ann Jenkins, Teacher - Middle School

Robert Foster, Teacher - Junior High

HAYS CONSOLIDATED INDEPENDENT SCHOOL DISTRICT

Diana Byers, Teacher - Elementary (Buda)
Nolan Kunkel, Principal - Elementary (Buda)
Joye Martin, Teacher - Elementary (Buda)

Karon Campbell, Teacher - Elementary (Wimberley)
Sharon Crowe, Teacher - Elementary (Wimberley)
Patsy Hess, Teacher - Elementary (Wimberley)
Jocelyn Pianta, Teacher - Elementary (Wimberley)
Gale Ponish, Teacher - Elementary (Wimberley)
Charles Ware, Teacher - Elementary (Wimberley)

Brenda DeViney, Teacher - Elementary (Kyle)
Martha Faulkner, Teacher - Elementary (Kyle)
Ernest Kimbro, Principal - Elementary (Kyle)
Beverly Shelton, Teacher - Elementary (Kyle)

Betty Armbruster, Teacher - Middle School
Marilyn Clack, Teacher - Middle School
Royce Swain, Principal - Middle School
Myrtle Turner, Counselor - Middle School
Carol Winkler, Teacher - Middle School

Sherry Beckmann, Teacher - High School
Betty Joyner, Teacher - High School
Wallace Lee, Teacher - High School
Sandra Richmond, Teacher - High School

Ann Sanders, Librarian/Learning Resource Center

LEXINGTON INDEPENDENT SCHOOL DISTRICT

Virginia Biehle, Aide
Billie Langchennig, Aide

Jan Woodward, Teacher - Elementary

LOCKHART INDEPENDENT SCHOOL DISTRICT

Jill Baker, Teacher - Primary

Lee Atwell, Teacher - Kindergarten
Dorothy Buckner, Teacher - Kindergarten
Melanie Jephson, Teacher - Kindergarten
Nancy Ohlendorf, Teacher - Kindergarten

Maxine Cassidy, Teacher - Intermediate
Dell Clark, Teacher - Intermediate
Lois Hagins, Teacher - Intermediate
Susan Masur, Teacher - Intermediate

PFLUGERVILLE INDEPENDENT SCHOOL DISTRICT

Bernice Kuempel, Teacher - Elementary
Betty Neimann, Teacher - Elementary

Jeff H. Rhodes, Principal - Middle School
Virginia Seebeck, Teacher - Middle School

Vernagene Mott, Teacher - High School

ROUND ROCK INDEPENDENT SCHOOL DISTRICT

Pat Primm, Librarian - Elementary (Berkman)
Jody Voigt, Teacher - Elementary (Berkman)
Linda Grant, Teacher - Elementary (Pond Springs)
Sandi Etheredge, Teacher - Elementary (Voigt)

John Haines, Teacher - Middle School
Sharon McKenzie, Teacher - Middle School
Nancy Spaulding, Teacher - Middle School

Hazel Sylvester, Supervisor K-8

Nell Burkland, Librarian - High School
Karin Echols, Teacher - High School
Karen Jones, Teacher - High School
Mary Ellen Lovett, Counselor - High School
Gary Marks, Teacher - High School
Mary Ann Miller, Teacher - High School
Doris Pyle, Teacher - High School
Nort Seever, Teacher - High School

SAN MARCOS INDEPENDENT SCHOOL DISTRICT

Beth Heatwole, Teacher - Elementary (Bowie)
Margaret Hoch, Teacher - Elementary (Bowie)
Katie Shults, Teacher - Elementary (Bowie)

Ann Boney, Teacher - Elementary (Travis)
Debby Waters, Teacher - Elementary (Travis)
LaVell Winn, Learning Coordinator - Elementary (Travis)

TAYLOR INDEPENDENT SCHOOL DISTRICT

Ross Baldwin, Principal - High School
Patty Clark, Teacher - High School
Maurine Frost, Teacher - High School
Mary Kay Gotcher, Teacher - High School
Peggy Mott, Teacher - High School
Naomi Pasemann, Counselor - High School
Dotty Rambo, Teacher - High School
Judy Rohde, Teacher - High School
Jeanne Sherry, Teacher - High School

Very special thanks are offered to ALICE BROWN, Project Director/ Gifted Consortium, Round Rock Independent School District; to IRENE HILTON, Director of Instruction, Hays Consolidated Independent School District, both members of the Gifted & Talented Advisory Committee; and to GRACE RICE, Consultant for Education Service Center, Region 10, Richardson, whose efforts made the pilot test and the extended field test a success.

We would be remiss if we did not also recognize here the splendid contributions of more than 35 mothers in the Richardson area, members of different parent associations for the gifted and talented, who also participated in the field testing.

PROCEDURE

The modular approach to professional growth is an alternative to attending workshops and institutes which may be inconveniently located and to taking college courses which may be scheduled at times that are awkward for the individual. The modules can be used for independent study, for small group interaction, or for a large group in-service program. They have been designed to serve as a minicourse, an introduction to the study of gifted child education.

The following is a step-by-step description of the proper procedure.

1. Read the goals and objectives thoughtfully so that you know what is expected of you by completion of the module.

2. Read the rationale to establish a frame of reference.

3. Try the preassessment and compare your responses with those given in the preassessment evaluation.

4. Score your responses IF YOU WISH; then determine whether you will complete those activities specified in the section headed "Entry Level" or whether you will select the activities you feel you need.

5. Proceed to work with the activities identified.

6. Try the postassessment to find out how successful you were in attaining the established objectives.

7. Compare your responses with those given in the postassessment.

8. Decide whether you will recycle as directed, proceed to another module, or invest your time and energy in something else.

The other modules in the STAR POWER series are listed on the inside back cover.

CONTENTS

Module

STEP ONE: LAYING THE FOUNDATION
- Enabling Objectives 1
- Rationale 2
- Preassessment 6
- Preassessment Evaluation 8

STEP TWO: SURVEYING THE LOCAL SITUATION
- Enabling Objectives 14
- Rationale 15
- Preassessment 16
- Preassessment Evaluation 17
- Activities 20

STEP THREE: PLANNING THE PROGRAM
- Enabling Objectives 28
- Rationale 29
- Preassessment 33
- Preassessment Evaluation 34
- Activities 38

STEP FOUR: SELECTING TEACHERS AND PLANNING STAFF DEVELOPMENT
- Enabling Objectives 60
- Rationale 61
- Preassessment 66
- Preassessment Evaluation 67
- Activities 70

STEP FIVE: EVALUATING THE PROGRAM
- Enabling Objectives 72
- Rationale 73
- Preassessment 75
- Preassessment Evaluation 76
- Activities 77

STEP SIX: FUNDING THE PROGRAM
- Enabling Objectives 78
- Rationale 79
- Preassessment 82
- Preassessment Evaluation 84
- Activities 96

POSTASSESSMENT 97

CONTENTS (continued)

Resources	98
Bibliography of Works Cited	99
About the Developers of the Program	101

"A good program for the gifted increases their involvement and interest in learning through the reduction of the irrelevant and redundant."

- Sidney Marland, Jr., former U.S. Commissioner of Education. EDUCATION OF THE GIFTED AND TALENTED, Vol. 1, p. 23.

STEP ONE: LAYING THE FOUNDATION

GOALS: To be familiar with the reasons the gifted/talented should have special provisions, different in quality from the general educational program, and to recognize the responsibilities of administrators and others to develop a program for the gifted/talented.

I. Enabling Objectives

Upon completion of this part of the module, you will be able to

1. List 3 types of giftedness besides intellectual and academic.
2. Define the term, "qualitatively different" in relation to a program for the gifted/talented.
3. Deliver a rationale for offering special educational opportunities to the gifted/talented.
4. State a meaningful philosophy about educating gifted/talented students.

II. Rationale

John Hersey's novel, THE CHILD BUYER (1960), tells of a gifted child who has come to the attention of United Lymphomilloid of America, Incorporated. This powerful company wishes to buy the child from his parents. The Vice President explains why (pp. 33, 34):

> About eighteen months ago my company ... was faced with an extremely difficult problem... and we needed some of the best minds in the country, and we looked around, and we found some minds that had certainly been excellent at one time, but they'd been spoiled by education. By what passes for education. Our schools, particularly at the elementary and secondary levels, speak with great confidence of their "solutions" for what they call the "gifted". ... There's a great deal of time spent on these so-called solutions, which are for the most part based on psychological and sociological theories between twenty and fifty years old, but no one seems to know what really works...
>
> The reason U. Lympho wants to get brains early is connected with a basic difficulty a brilliant youngster has in this country. At an astonishingly early age he goes through a quest for meaning, for values, for the significance of life, and this quest turns, also early, into a struggle to make a place in society and to find values in it that will meet his particular needs. I hardly have to tell you that the culture in which we live is riddled with inconsistencies, from the point of view of a child with a quick mind, who sees that he is punished more than he is rewarded for his brilliance. A bitter inharmony results. The individual expends so much emotional energy trying to resolve this inharmony that, having started out in primary and elementary school years the most normal and well adjusted of all his peers, he winds up, before very long, the least so.

Educators who are concerned about the welfare of the gifted/talented will agree that these students are often spoiled by "what passes for education", that they are, indeed, punished for their brilliance and crea-

tivity - by administrative and community indifference, by teacher resentment of their abilities and hostility toward their eager, questing minds, also by classmates' ridicule of their superior knowledge and abilities.

Confronted by many other problems, school personnel have conveniently written off the special needs of gifted/talented students with these comfortable misconceptions:

1. We have no gifted students.
2. The gifted will get along by themselves.
3. A good teacher attends to the needs of all students equally.
4. What's good for one is good for all.
5. With a program of individualized instruction, special provisions for the gifted/talented are unnecessary.

and with these excuses:

1. Insufficient funds
2. Higher priorities
3. Lack of time to apply for federal/state funds
4. Lack of personnel
5. Community opposition to making an elitist group.

The Elementary and Secondary Education Amendments of 1969, Section 806, indicate that gifted/talented children ("one of the most neglected and potentially productive groups of students," said Sidney Marland, Jr., U.S. Commissioner of Education, 1972) should benefit from Titles I, III, and IV of the Elementary and Secondary Education Act (ESEA) and the Higher Education Act of 1965. But a survey revealed that the states had made little or no use of these federal funds to provide special opportunities for gifted students. Senator Jacob Javits and others pressed for specific legislation to direct attention to the needs of the gifted/talented, and Public Law 91-230 was passed, establishing leadership in the U.S. Office of Health, Education, and Welfare with the Office of Gifted and Talented

and appropriating $200,000 for the first of a number of National/State Leadership Training Institutes on the Gifted and Talented.

In Texas the 64th Legislature (1975) passed House Bill 280, defining the term "gifted and talented," providing for the appointment of a full-time director of programs for these students and an advisory council on education of the gifted/talented, and the establishment of demonstration programs in various regions of the state. The following year education of the gifted/talented was adopted by the Texas State Board of Education as a priority, and a state plan was designed which called for the development of qualitatively different programs for the gifted/talented in 50% of the school districts in Texas by 1978.

To be successful, a program for gifted/talented pupils will have a sound foundation and will be endorsed by administrators, school board members, teachers, and the community, including the students involved. The program cannot be the product of a few individuals' enthusiasm, something that vanishes when those individuals move on - as has so often been the case. Nor can the program be regarded as a frill to be abandoned when funding is unavailable or when a "higher priority" comes along. There can be NO HIGHER PRIORITY for any school district than educating ALL students TO FULFILL THEIR GREATEST POTENTIAL. The gifted/talented must no longer be the orphans of education, their needs ignored and their personalities and creativity crippled by neglect.

The program will be designed with the characteristics and needs of ALL gifted/talented students in mind, not just those of the intellectually/academically gifted, as an ongoing part of the educational process

from K through 12 throughout the life of the school district. The provisions will be formalized into a written plan approved by the community and adopted by the local Board of Trustees in order to assure a firm, unified effort. When completed, such a plan will not become a cast-in-concrete guide for all time, however, but a living document subject to changes as society changes.

This module has been developed to assist in the design of such a program.

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

Part 1

Complete each statement with the best answer.

1. Generally speaking, the single person most crucial to the success of a school's gifted/talented program is

   a. a consultant trained in gifted education.
   b. a dedicated teacher working with the gifted.
   c. the principal assigned to the school.
   d. the superintendent of the school system.

2. The first <u>two</u> steps in planning a program for the gifted should be

   a. establishing a written philosophy about education of the gifted/talented.
   b. analyzing the resources of the school, including personnel and funds.
   c. surveying the student population to determine those who are in need of a special program.
   d. polling gifted students for their opinions about the existing program offered in school.

3. Successful programs for gifted/talented students have as a common feature

   a. approaches geared to the gifted/talented students in the local community.
   b. individualized instruction in all classes at all levels of development.
   c. teachers with special training in educating the gifted/talented students.
   d. adequate federal or state funding for at least the first three years.

4. Proponents of a gifted program will be most effective in enlisting support if they

   a. make friends with several gifted/talented children.
   b. urge parents of gifted/talented children to organize.
   c. have a sound knowledge of the literature on giftedness.
   d. stress the contributions of the gifted to society.

5. When a district's resources are limited, a gifted program should be

provided

a. at the pre-school/primary level.
b. at the middle school level.
c. at the junior high level.
d. at the high school level.

6. In general, the most important requirement for a teacher of gifted/talented students is

a. at least one college-level course about educating the gifted.
b. an I.Q. of at least 130, but preferably not more than 150.
c. flexibility and imaginative teaching methods and ideas.
d. thorough knowledge of the special subject area(s) taught.

7. The single factor that most often inhibits the establishment of a gifted program in a school is

a. an insufficient number of gifted and talented pupils.
b. inadequate methods for identifying the gifted.
c. inadequate means of raising needed funds.
d. misconceptions about gifted students.

8. In the state of Texas, legislation for the gifted/talented defines gifted and talented students as students with
a. extraordinary learning ability.
b. leadership ability.
c. outstanding talent in the creative arts.
d. outstanding talent in the vocational arts.
e. a combination of the above (SPECIFY).

Part 2

9. Explain what is meant by a "qualitatively different" program for the gifted/talented.

10. Explain the difference between "enrichment" and "programs" for the gifted/talented.

11. Write a rationale which explains why special educational provisions should be made for the gifted/talented.

12. State a philosophy of gifted child education appropriate for your local situation.

Turn to the next pages and compare your responses.

GT # 9

PREASSESSMENT EVALUATION

Part 1

1. c

Although the leadership and support of the superintendent and Board of Trustees is essential to effective programs, the KEY INDIVIDUAL in a successful, continuing program is the school's principal, for teachers must rely upon his/her cooperation and leadership. Syphers (1972, p. 1) makes the point this way:

> Since specialized training for teaching gifted children is rarely required and suitable instructional materials must be sought out, how a principal perceives the needs of gifted children and how he or she goes about meeting them constitute the determining factors in the success of a program. ...Without a principal's active involvement on a continuing basis, a school can have a "program for gifted" on paper and proceed with business as usual, scarcely changing the quality of the school experiences for the gifted child.

2. a, c

The first step in planning a program for the gifted/talented should be to establish a philosophy about the education of these students, for it is from the philosophy that goals and objectives are formulated. These two elements - goals and objectives - will control every stage of the endeavor from planning to evaluation.

The second step is surveying the student population to discover who the students are that need special provisions and what kind of provisions are needed.

3. a

Programs for the gifted cannot be reduced to a single formula or recipe for success because the NEEDS of particular gifted groups and LOCAL CONDITIONS AND ATTITUDES vary from one district to another, even from one campus to another. Yet in the face of much programing diversity, one element that remains constant in successful programs is a FLEXIBLE, DIFFERENTIATED approach based on the specific needs of the gifted in the particular community and school.

4. c

Proponents of a gifted program must be armed with information if they

are to have an impact on enlisting school and community support. They must be familiar with the literature about gifted children in order to separate the facts from much unfounded fiction about gifted children. They must be acquainted with some of the successful ways of providing for this special group in other communities so that they are aware of alternatives appropriate for the gifted children in their own area. They must also have a thorough grasp of the facts about their own school and community - the number and background of gifted children, the workings of the school and the school system, and the nature of local resources.

5. a

The importance of early identification can hardly be overemphasized. According to Martinson (1974, p. 10), an authority on education for the gifted/talented,

> Many school systems still do not identify the gifted until they are in the upper middle grades or beyond. Such policies are made in the name of economy, but the result is that thousands of gifted children who enter school with high motivation and great anticipation experience frustration and boredom and eventually come to regard school as dull and uninteresting. Dropout and disenchantment with learning are the result, and the presumed economy turns into waste. If choices must be made, it is more economical to identify gifted children in the early grades. These children are in school longer, and the waste of underachievement can be avoided or at least reduced.

6. c

Although specialized training, superior intelligence, and knowledgeability are all assets to a teacher, flexibility and imaginative approaches have been demonstrated to be the most essential qualities in a teacher of gifted/talented students.

7. d

In a report prepared by the National Leadership Training Institute on the Gifted and Talented (Olson, 1975), the major constraint cited was misconceptions about giftedness, particularly the mistaken notion that gifted children are already well-served or that they can succeed on their own without special provisions.

8. e - all of the others: a, b, c, d

House Bill 280 added Section 11.19 to the Texas Education Code which defines gifted and talented students as

students with extraordinary learning or leadership ability or outstanding talent in the creative or vocational arts whose development requires programs or services beyond the level of those ordinarily provided in regular school programs.

Part 2

9. "Qualitatively different" programs are based on the special characteristics and needs of the gifted/talented which are unlike those of other students.

   Such programs look to the future for these future leaders of society, not to the past or even the present, as most educational programs do. They offer subjects/courses which dispense with or condense the usual grade level content, offer more challenging substance, include elements of disciplines not usually available to students in elementary and secondary school, such as anthropology, biochemistry, archaeology, comparative religions... Qualitatively different programs require higher cognitive concepts and processes (See Modules 3 and 4 in this series.) and emphasize creativity. A larger number and variety of more advanced resources are provided than students of average or below average ability require.

   Qualitatively different programs demand a higher level of intellectual functioning than other students can cope with.

10. "Enrichment" - meaning "that which makes more meaningful, more rewarding" could be synonymous with "programs" in certain cases, but all too often is a mask to conceal the fact that nothing at all is being done for the gifted/talented. Where enriching activities are actually provided, they occur randomly and reach only those few able students who happen to have the "right" teacher(s). For the developers of this program, enrichment has meant activities with a plan and a purpose which teachers can incorporate in their regular schedules without special permission from administrators. "Programs," on the other hand, are a series of special courses, curricula, and/or activities agreed upon by both school personnel and the community as essential for providing stimulation and depth for gifted/talented students. Good programs are characterized by their CONTINUITY from level to level.

11. YOUR ANSWERS WILL VARY, but they should include similar ideas.

    Read each of the following rationales. Then compare yours, noting omissions and additions. Revise yours so that it will be more effective.

How can a special program be justified for a relatively limited percentage of students in public school? On the very concept of democracy - which is so often used to protest, even block, special programs for the gifted/talented: EQUAL OPPORTUNITY. Every child should receive an education which enables him/her to fulfill whatever potential he/she has. But the gifted/talented have been regularly denied the kind of education which would enable them to achieve at the levels of which they are capable. They have been forced to plod with the pack when they have been given wings to fly.

In athletics - an expression of outstanding psychomotor ability - only a limited percentage of students with superior strength, speed, energy, stamina, coordination, and drive to achieve have long been singled out and have not only been offered special opportunities to develop and improve their special abilities among other students with like abilities and interests regardless of grade placement, but also had provided for them special equipment and coaches knowledgeable in particular areas to help them make the most of their talents. Communities have recognized the appropriateness of this kind of attention to a select group and have been quick to approve budgets and/or bonds for new schools when loss of special athletic programs has been threatened.

Students who are gifted in other ways - in dramatics, art, music, and creative thinking, as well as in intellectual and academic areas - also need to receive the kind and quality of attention which schools devote to identifying and serving those capable of making the team: provision of opportunities to be with their true peers, not just their agemates, at some time during the school day; instruction geared to their levels of ability with advancement based on talent, not age; needed equipment or resources in order to achieve their best, and teachers selected according to their temperament, training, and experience for work with abler students.

Society has a great need for the contributions which the gifted/talented have to offer. Leaders are needed in every area of endeavor: commercial, industrial, governmental, educational, religious... Also needed are men and women with the courage to look ahead to the future and the vision to anticipate abrupt changes so that steps can be taken to cope with those changes before they arrive as crises that stun people into what Alvin Toffler described as "Future Shock." Artists, writers, and performers are needed to entertain and enlighten populations who will have more leisure than ever before.

The individuals to whom society will eventually be looking are in our schools right now, wasting time as they wait for the less able to learn what they have already mastered, wondering how much longer they can tolerate the boredom and frustration of accomplishing none of the things of which they are capable.

We cannot afford to drive our gifted/talented young people out of

school - to become aimless drop outs. We cannot afford to drive our young people into drug abuse for release; into criminal acts or lawless attitudes toward a society which seems to have no place for them, which does not seem to value what they have to offer. We must recognize and design programs which will permit the gifted/talented to make as much progress as they can so that they will become productive contributors to the betterment of society and to their own self-actualization.

b

The Southern Regional Project for Education of the Gifted (1962, p. 22) offers this rationale:

(1) Gifted students as a group differ from others in learning ability; they learn faster and remember more, and they tend to think more deeply with and about what they learn.

(2) As adults, gifted persons tend to remain similarly advanced beyond the average and tend to assume distinctive social roles as leaders in the reconstruction and advancement of whatever lines of activity they engage in.

(3) The regular school curriculum only barely approximates the demands of either the greater learning capacity or the anticipated social roles of gifted persons.

(4) An educational program CAN be devised which DOES more adequately meet these basic demands, and which on the whole being uniquely suited to the gifted is both unnecessary for and impossible of accomplishment by students of lesser ability.

(5) Differentiated educational provisions for the gifted promise to discover more gifted persons, to improve their education, and to launch them earlier into their chosen careers so that society as well as the persons themselves may enjoy longer the fruits of their productive and creative labors.

12. Again, answers will vary depending on local situations. Your philosophy of gifted child education should address these concerns:

a. Who are the students to be considered "gifted and talented" in your school/district?

b. What is the purpose of making special educational provisions for this group?

c. What is the focus of the program: quantity or quality, the <u>what</u>

of learning or the how to learn?

d. How should the progress of the gifted/talented be measured - against the group, the average, or the individual student's self?

A sample philosophy which addresses those questions is as follows:

> The —— school/district believes that the major outcome of education for the gifted/talented should be the development of each individual's unique gifts and talents. Learning how to learn is basic to this group, for not only do they tend to learn rapidly and retain what they learn, but in addition, what they learn must change with rapidly changing times; therefore, emphasis on content cannot be a meaningful focus. The nature of gifted/talented students requires an education that differs in the quality of experiences provided for them in order to stimulate and challenge them to maximum achievement. The measure of a successful program for the gifted/talented will be the degree to which they have become productive individuals, responsive and responsible, aware of their potential and strong in their self-esteem.

If your philosophy does not address the questions posed, revise it.

STEP TWO: SURVEYING THE LOCAL SITUATION

GOAL: To understand the steps involved in planning a program for the gifted/talented.

I. Enablino Objectives

Upon completion of this part of the module, you will be able to

1. List significant steps involved in planning a program for the gifted/talented.
2. Complete a chart of planning activities, including assignment of responsibilities and projected time spans.

II. Rationale

Planning is the key to success in most ventures.

Depending on the size of the school/district, including the number of students and staff members, the planning phase of a program for the gifted/talented varies in scope and complexity. In Region XIII where in 1978 the smallest school district had fewer than 30 students and the largest more than 52,000, the magnitude of the planning phase would obviously be considerably different. In the former, with one rural elementary school, the principal and staff members could probably hold one or two evening meetings with community representatives and complete the planning within a few hours. In a large district, the planning phase could easily consume a year.

Even in a small or a relatively small school district, anyone who contemplates undertaking a program for the gifted/talented is likely to feel overwhelmed, wondering where to begin. It is encouraging to know that others have already worked out procedures that are effective and that can be adjusted to individual needs. The more orderly and systematic the planning, the more successful a program is likely to be.

Planning should be a cooperative venture, partly to share the demands on time and energy, partly to involve as many individuals as possible, for meaningful involvement tends to produce more interest in the gifted/talented and a more favorable attitude toward making special provisions for this group of students. Not just school personnel, but also representatives of the community, even of the student body, should be part of the planning at some stage. 15

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

1. List the different kinds of information needed prior to beginning to make plans.
2. Group the kinds of information-seeking into tasks. Indicate beside each task the person(s) likely to be involved.
3. Beside each task given for Number 2, write an estimate of the amount of time required for completion of the task.

   (NOTE: You may wish to set up a chart like the following:

TASK	PERSON(S) RESPONSIBLE	ESTIMATED TIME

Turn to the next pages and compare your responses.

PREASSESSMENT EVALUATION

1. Kinds of information needed

   a. Characteristics of gifted/talented students

   b. Needs of gifted/talented students

   c. Abilities of the gifted/talented in your school/district

   d. Resources of the school and community

      (1) Physical features

      (2) Personnel

      (3) Financial resources

   e. Types of programs possible

   f. Organizational prototypes

2. Tasks

   a. Designate leadership. (A full-time or part-time coordinator is needed who can devote his/her complete attention to the details involved. This person may be a central office administrator, a principal, a certified staff member with special concern for the gifted who is given release time to perform this function. Or an experienced person may be hired just for this purpose.)

   b. Appoint a steering committee or Task Force to review literature on gifted child education, including an official definition of giftedness and information about the nature and needs of gifted children. This group should be composed of interested staff members and volunteers among parents of gifted children and other community representatives.)

   c. Screen the student population.

      (1) Cum records of scores
      (2) Nominations from teachers, age-mates, parents, students themselves (through checklists, rating scales, questionnaires... (See Module 1 in this series.)
      (3) Tests as needed (not necessarily standardized I.Q. or achievement tests) (See Module 10.)
      (4) Evaluation of performance in areas of leadership, psychomotor

ability other than athletics, visual and performing arts, creative and productive thinking...

(5) Review of honors, awards, offices held in clubs, classes, or community groups

The entire certified staff should be involved in this, not just for a given grade level or in a particular content area where an unusually high number of able students have appeared, but from K through 12 or whatever the range is in a given school or district. Because this will be a time-consuming operation, staff members should be given release time to perform these assigned duties. In addition, experts in the special areas indicated in c (4) should be invited from the community to evaluate performance.

d. Assess local conditions, attitudes, and resources

(1) Physical plant - what facilities are available in the school/district: library/media resources, laboratories, stage and equipment for dramatic performances or dancing, large room with good acoustics and equipment for musical training of groups and presentations, rooms appropriately located for art activities with necessary equipment... What places in the community can be used if the school lacks adequate space or facilities - A community center? Churches? Public library?

(2) Personnel - are any of the teachers especially well-suited by temperament, interest, experience, and training to work with the gifted, possibly in several different areas? Are any members of the community, including parents, experienced and talented in various areas who might become resource persons, mentors, tutors, even teachers of minicourses?

(3) Financial - what is the budget situation? Tight or relatively loose with a surplus that could be used for gifted child education? Does someone have the time and expertise to prepare project proposals for grants? Or can current resources be reallocated, at least to begin a program for gifted children?

e. Study types of programs possible. (Many program planners begin with administrative arrangements, such as determining whether to have cluster grouping, acceleration, a resource room, etc. But none of these constitutes a PROGRAM any more than scheduling marching band for 2:00 in the afternoon represents a program for that class.) What special opportunities will the students chosen for the gifted program be offered? What are the principles upon which the program is to be based? (Back to your philosophy of education for the gifted!) Once those principles have been determined, then

organizational prototypes can and should be considered. What programs are operating successfully, and can they be visited?

(Here again the committee or Task Force will be heavily involved, but the visits should be made by administrators AND TEACHERS WHO WILL BE WORKING WITH THE GIFTED/TALENTED.)

3. Time estimates will vary depending on the nature of the tasks, the number of people available to perform the tasks, the number of students to be screened...

For a rural school with an enrollment of 100 and a staff of 7, the review of cum folders, the process of nominating and evaluating performance, etc., may take an estimated total of 7 hours per staff member. Assessing local conditions may be done in two weeks or less, especially if the community has, for example, only five privately owned small businesses, one small church, an adult population of 38 - most of whom are busy from dawn till dusk just eking out a living, and the school operates on a very tight budget. There is no reason, however, for ignoring possibly 10 gifted/talented students. This kind of situation is common in many rural schools, and the problem is more acute the farther apart different districts are. In Texas, this may be 20-40 miles, making a consortium of small districts difficult to organize and sustain. However, there ARE ways rural schools can accommodate their gifted/talented students.

In an urban system with 4,000 or 5,000 students and 20-30 faculty members in a community with several churches, a small college, various kinds of small and medium-size businesses, and residents talented and experienced in special areas, the time estimates will be considerably greater.

And, naturally, in cities as large as, or larger than, Austin, the time estimates will be even greater in spite of the larger number of helpers available.

IV. Activities

Assume that you are the designated leader for this project.

1. In order to find out how your colleagues feel and think about offering special provisions for the gifted/talented, administer the survey, Exploring Attitudes. Emphasize that this is to be completed ANONYMOUSLY and frankly by each individual. When the survey sheets have been collected, review them to determine how much support you have for beginning a program for the gifted/talented.

EXPLORING ATTITUDES

Respond to the statements in the column at the left.

IT IS SAID	YOUR RESPONSE
The gifted/talented group is already well-served by the present educational system.	_____
Special programs and services for the gifted cost too much money and take away from other programs.	_____
There are more critical target groups to be served among the special education population than the gifted/talented who have already been blessed with good fortune.	_____
Programs for the gifted create an elitist population.	_____
Programs for the gifted/talented reinforce the segregation of students.	_____
What is good for the gifted is good for all children.	_____

(continued)

If classroom teachers were doing their jobs, there would be no need to offer a special program for the gifted.

_____

_____

The use of individualized instruction abolishes the need for separate provisions for the gifted.

_____

_____

When you have examined the responses and compared them with the following statements of fact, reread the rationale you wrote for Preassessment, Number 11, page 7, and add to it any information which you think will strengthen your position. Then communicate to your staff your intent to undertake a program for the gifted/talented, and invite volunteers for the steering committee or Task Force (whatever you have decided to call the group). Also solicit the names of members of the community who might wish to serve. (NOTE: A volunteer steering committee is more likely to be committed to the responsibilities and tasks than one appointed "from on high.")

Compare your responses with the following statements.

FACTS

"already well served..." — The study prepared by the U.S. Commissioner of Education in 1971 revealed that fewer than 4% of the country's 2.5 million gifted/talented youth were receiving services commensurate with their needs. A survey conducted by the Texas Education Agency in 1975 showed that less than 1% of the schools in this state had special provisions for the gifted.

"cost too much" — Creative instructional planning does not have to result in expensive programs. Special types of provisions require no more than a reallocation of already existing resources. Community members and facilities are often available on an inexpensive or even volunteer basis. An investment in programs for the gifted/talented has potential benefits far beyond the initial investment.

"more critical target groups"	The needs of this special group are as legitimate as the needs of any other special population. High potential cannot be realized without active encouragement to nurture it. The gifted/talented have consistently been deprived of the kinds of special provisions needed to enable them to develop their gifts. They are now our most handicapped, functioning two or more years below their potential even though achieving at grade level with high marks.
"elitist population"	A special program for gifted/talented pupils is not a reward or a status symbol, but one aspect of the school's attempt to provide for individual differences among all children.When these students understand the reason they are offered special opportunities and are invited to share what they have learned, they relate more successfully to others.
"reinforce segregation"	The very nature of giftedness and talent separates these children from others. But physical separation for various purposes at various times enables the gifted/talented to profit from learning experiences which would be too advanced for the rest of their age-mates. Occasional or part-time separation enhances the quality of education for all children, encouraging the less able and the shy to blossom when not constrained by the faster learners, the more outgoing personalities.
"good for gifted"	To the extent that provisions for gifted/talented children often emphasize more effective teaching methods and more stimulating learning experiences, some of the educational goals for the gifted may

also apply to other children. But a program tailored to the gifted/talented causes frustration and failure for the average and below average. Conversely, a program designed for the average and offered to the gifted restricts self-fulfillment by causing frustration and often failure for the gifted who become bored and who tune out of assignments and discussions that are not challenging.

"doing their jobs"

The typical classroom teacher in the elementary school is usually a generalist with varying amounts of background in several content areas and probably lacks the ability to cope with the very advanced knowledge and diverse interests of some gifted/talented students. The average teacher in secondary school is, by contrast, a specialist in usually two closely related fields and lacks the expertise to guide students gifted or talented in other areas.

Moreover, in a heterogeneous student population, the range of abilities and levels of skill development are too great for one teacher to challenge one or more students operating at advanced levels while also helping students needing remedial instruction at possibly lower elementary grade levels and also carrying on the usual program for those students working at the level of grade placement. This is especially true in high school where teachers often serve more than 100 students each day.

"individualized instruction"

This term has become meaningless because of misuse and misinterpretation. If every child had a program tailored to his/her particular nature and needs, individualized instruction could help the gifted/talented to proceed at their own more rapid learning pace and to explore in depth their areas of special

interests. But individualized instruction is not a substitute for special programs that expose the gifted/talented to learning opportunities beyond the confines of even the best individualized instruction.

2. Communicate to the community your intent to undertake a program for the gifted/talented, again presenting your rationale for doing so. Invite volunteers for the steering committee or Task Force. (This may be oral communication at a public meeting called for this purpose or written communication in the form of a letter to parents and/or an announcement in the newspaper.)

3. When the steering committee or Task Force has been selected, outline the duties and responsibilities within a specified time frame. Use the following form and have a worksheet prepared for use by the groups.

TASK	PERSONS RESPONSIBLE	TIME FRAME Beginning	Ending

4. While the group indicated in Number 3 proceeds with its designated obligations, arrange for the staff to complete the survey of cum records and to administer specified informal measures to locate giftedness not revealed by information in the cum records. Have the same kind of worksheet used by the faculty. (Reread the list of tasks on pages 17 and 18 and decide how the total workload can be equalized.)

5. Review the rosters submitted and compute percentages of students identified in the following different areas of giftedness:
   * intellectual ability
   * academic ability in specified subject area(s)
   * creative and productive thinking
   * leadership
   * visual arts
   * performing arts
   * psychomotor aptitude.

   Compare these percentages and the total with the gifted/talented as a whole in order to determine the overall nature of the program indicated and its specific emphases.

6. Make an assessment of the school/district resources: staff, facilities, etc. Add community resources which might be available. Use the worksheet on the following page for this.

GT # 9

WORKSHEET: Personnel and Support Services

PLEASE DO NOT WRITE IN THE MODULE.

1. List any teachers or administrators in the school/district who have had some training in working with the gifted/talented.

2. List any teachers or administrators in the school/district who have had some practical experience with gifted/talented students.

3. Nominate at least 5 individuals in the COMMUNITY who have expertise or talent that could be utilized in a program for the gifted/talented. Specify their area(s) of expertise or talent.

4. List at least 3 local or area facilities that could be integrated with a program for gifted and talented students (such as a factory or industry, a museum, a camp, a community college, a TV or radio station, a laboratory, a theatre, a media studio, an historical site, an annual community event...".) "Facility" should be interpreted broadly.

5. List at least 3 professional organizations or special-interest clubs in the community that could be a resource in a gifted program.

6. List any community members (especially parents) who have actively shown commitment to the concept of special programs for the gifted/talented.

7. List any parent or other associations that have been established in the area for gifted/talented children.

8. List the names and addresses of state and national organizations and leaders who might be of help in starting a program for the gifted/talented. Indicate those which regularly publish a journal or newsletter or which sponsor conferences.

   (NOTE: The following page is a FACT SHEET providing some useful names and addresses.)

(continued on page 27)

GT # 9

FACT SHEET

Texas Education Agency
Division of Gifted and Talented
201 E. 11th St.
Austin, TX 78701
Program Director/Gifted and Talented Students: Ann G. Shaw (512/475-6582)

Texas A & M University
College of Education
College Station, TX 77840
Assistant Professor of Educational Psychology: Dr. William R. Nash

Education Service Center, Region XIII
Instructional Services Division
7703 N. Lamar
Austin, TX 78752
Consultant for the Gifted and Talented: Dr. Bill Davidson (512/458-9131)

Mrs. Judy Judy
Instructional Coordinator for Vanguard Program
Principal, River Oaks Elementary School
Houston, TX 77002

Ms. Bess Tittle, Director
Creative Learning Center (for preschool, especially minority children)
Dallas, TX 75221

Ms. June Cox, Academic Director
Gifted Students Foundation
Arlington, TX 76010

Dr. E.R. Simmons, Director
Gifted Youth International
Austin, TX 78701

Texas Music Educators Association
P.O. Box 9908
Houston, TX 77015

National Association for Gifted Children
Route 5, Box 630 A
Hot Springs, AR 71901
(Publishes The Gifted Child Quarterly and holds annual conventions.)

The Association for the Gifted(TAG)
Division of Council for Exceptional Children
1920 Association Drive
Reston, VA 22091
(Publishes the Journal for the Education of the Gifted and holds national conventions annually with the CEC convention)

National/State Leadership Training Institute on the Gifted and Talented
316 W. 2nd St., Suite PH-C
Los Angeles, CA 90012
(Sponsors leadership institutes, provides technical assistance, and speakers. Publishes Bulletin.)

Southwestern Regional Office
College Entrance Examination Board
211 E. 7th St.
Austin, TX 76701
(Conducts Advanced Placement program, provides information)

University Interscholastic League
The University of Texas
Box 80281, University Station
Austin, TX 78712

Texas Art Educators
c/o Dr. Marvin Platton
Texas Tech University
Lubbock, TX

Texas Student Film Festival
Texas Education Agency
201 E. 11th St.
Austin, TX 78701

(This is merely a sampling of individuals and agencies interested in the gifted.)

7. Schedule a time for members of the steering committee or Task Force to present a preliminary report of their findings to school personnel and community. Encourage questions from the audience.

   Prepare a form for feedback and distribute it to the audience for completion prior to their leaving.

8. Compile audience reactions and present this information to the steering committee or Task Force for consideration and appropriate action in amending or expanding their report.

9. From the philosophy you wrote for the Preassessment, Number 12, page 7, derive goals which would be appropriate for your gifted/talented program. Submit these to the steering committee or Task Force and to the faculty for comments. Revise if feedback warrants.

10. Prepare cost estimates for individual intelligence tests, various types of programs, including additional staff if needed, for purchases of special equipment and/or materials, for special opportunities that might be offered, etc.

11. Prepare a report combining the findings of the steering committee or Task Force, the faculty, and your own assessments.

    Present this report to the Superintendent and/or the Board of Trustees for their information and for formal approval of

    a. Undertaking a program for the gifted/talented
    b. Statements of philosophy and goals.

STEP THREE: PLANNING THE PROGRAM

GOAL: To realize the procedures needed to establish and implement an effective program for the gifted/talented.

I. Enabling Objectives

Upon completion of this part the module, you will be able to

1. Develop goals and objectives appropriate for the local situation.
2. Devise a curricular structure which will coordinate program activities from primary through secondary school.
3. Determine the most effective model(s), or prototype(s), for administrative organization.

II. Rationale

"Planning for the gifted and talented is as complex and multifaceted as are the children themselves," Ruth Martinson states in PRINCIPAL, February, 1972, p.47. Planners of new programs for the gifted/talented often look to other schools to see what they are doing. This is a natural and logical approach as long as the planners are not seeking a blueprint to be followed exactly in developing their own program, for

> The perfect program for the gifted does not exist. (Nissen, p. 87)

The most important consideration to keep in mind after studying what other schools have done and after visiting other schools to observe particular programs in action is where the true abilities and talents of the gifted/talented students in your school/district lie, as well as the needs of the gifted/talented in general.

At this point most authors present information about organizational arrangements before discussing the nature of the program itself. It does not make sense to us to select arbitrarily a pattern of models - for example, resource teacher for K-3, semi-separation for half of each day for Grades 4-6, seminars and independent study for Grades 7-9, and acceleration for Grades 10-12 - before studying the needs and relating to those needs.

Kirk (1962, 1972, p. 154) recommends the following modifications in content:

1. Emphasizing the gross structure and basic ideas of subject matter fields.

2. Placing emphasis on HOW information is derived rather than on WHAT information is derived.
3. Taking a cue from the child's interests and readiness.
4. Expanding the curriculum in both depth and breadth.
5. Providing consultation and guidance.

Martinson (1972, pp. 47,48)urges"dealing with major questions, basic issues, important human experiences, experimentation and invention, the interdependence of life, and moving aesthetic and creative experiences. "Such education," she says later, "is education based on the right of the child to take an active part in the determination of his own learning agenda, to question, and to learn from the search for his own answers, and in the process to expand his talents, knowledge, interests, and curiosity about his particular universe."

A concern for teaching research skills early in a child's schooling is emphasized by such leaders in gifted child education as Torrance and Renzulli - not just library research skills,but the concepts and methods of creative scientific research and the raw materials involved in historical, descriptive, and experimental research. It is difficult for many gifted/talented students to realize the first time they have to prepare a research study that meaningful research cannot be hastily completed the night before the assignment is due because their other assignments all too often can be tossed off during the lunch period or during the class before the one in which the assignment is due.

Other concerns in program development include the following:

1. Development of enriched sensory awareness with attention

to helping organize thoughts to communicate more efficiently in whatever medium is chosen.

2. Affective and psychomotor, as well as cognitive, education
3. Emphasis on inquiry, problem-solving, and creative thinking skills
4. Interdisciplinary studies (because of the greater urge and ability of the gifted to see relationships and to understand WHY things are as they are)
5. Leadership training, including exercises and discussion to sharpen communication skills, decision-making, and dynamics of group interaction, followed up by special assignments involving use of these three abilities in activities from "directing a school play to approaching community leaders for greater financial support for the arts." (Center for Creative Youth, 1977, a booklet describing a summer program for Connecticut students).

The Conant report of 1959 on the status of the American high school included these criticisms:

> The academically talented student, as a rule, is not being sufficiently challenged, does not work hard enough, and his program of academic subjects is not of sufficient range. The able boys too often specialize in Mathematics and Science [sic] to the exclusion of foreign languages and to the neglect of English and Social Studies [sic]. The able girls, on the other hand, too often avoid Mathematics and Science as well as the foreign languages. (p. 40)

DeHaan and Havighurst (1957, 1961) point out, "Teachers have

largely understimated how much gifted children can learn and how well they can perform." (p. 79) Guidance counselors have also been misled by the greater abilities of the gifted/talented and have all too often made the mistake of piling more academic work on this group when what they should have been having is exposure to such areas as art, music, wood and metal shop, ceramics, and a variety of other crafts for self-expression and for exploration of new interests.

There are many ways of providing the kinds of learning experiences needed by the gifted/talented. What these will be in your school/district will depend on the special gifts found among students identified as having potential in the different types of giftedness and on the goals and objectives established as a result of discovering the strengths of the group which are to be developed further.

(Skip page 32 A and go on to page 33.)

GT # 9

NATIONALLY RECOGNIZED EXPERTS

IN GIFTED CHILD EDUCATION

There are a number of highly qualified and experienced leaders in gifted child education. Some are prolific researchers and writers and also travel the "lecture circuit," appearing at practically every major convention. Others are more interested in occasional lectures or technical assistance. Some are dynamic, stimulating speakers, while others are rather uninspired speakers although what they have to say is worth hearing! The most popular speakers have asterisks beside their names. Some are young, up-and-coming.

Alexinia Baldwin, Asst. Prof., Dept./Curriculum and Instruction, State University of New York, Albany (12201)
Kay Bruch, Dept./Educational Psychology, University of Georgia at Athens (30601)
Joseph French, Shippensburg State College, Shippensburg, PA (17257)
James Gallagher, Director, Frank Porter Graham Child Development Center, University of North Carolina, Chapel Hill (27514)
* Marvin Gold, Dept./Special Education, Box 2592, University of South Alabama, Mobile (36688) Now publisher of the magazine about gifted child education, G/C/T.
* Joe Khatena, Marshall University, Huntington, WV (25701)
* Joseph Renzulli, Dept./Special Education, University of Connecticut, Storrs (06268)
Dr. Julian Stanley/Lynn Fox, The Johns Hopkins University, Baltimore, MD (21218) Both interested in the mathematically gifted primarily.
Dr. Abraham J. Tannenbaum, Teachers College, Columbia University, NY (10027)
Dr. Calvin W. Taylor, Psychology Dept., University of Utah, Salt Lake City, (84102)
Dr. E. Paul Torrance, University of Georgia, Athens (30601)
Dr. Frank E. Williams, 3760 Dallas Rd. N.W., West Salem, Oregon (97304)

MEMBERS OF THE N/S LTI G/T

* Dr. Irving Sato, Director
* Dr. Sandra Kaplan, Asst. Director
David Jackson, Executive Director
James Curry, Coordinator
Thelma Epley
316 W. Second St., Suite PH-C, Los Angeles, CA (90012)

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

1. List 5 needs of the gifted/talented related to their special characteristics which make them different from the rest of the school population.
2. Describe a curricular structure which will provide meaningful learning experiences and will enable each student in the gifted/talented program to progress successfully from primary level through high school.
3. List 5 different kinds of adminstrative arrangements which will enable students to make the most of their opportunities.

Turn to the next page and compare your responses.

GT # 9

PREASSESSMENT EVALUATION

1. ANSWERS WILL VARY. In Module 2 of STAR POWER the following needs are indicated as special needs corresponding to the special natures of the gifted/talented:

   * Opportunities to work with other gifted/talented students at least part of the time

   * Freedom from the restrictions of structured requirements and limited time frames

     > One of the criticisms voiced frequently by older gifted children is that bells, periods, schedules, and teachers all interfere with their learning.
     > Martinson (1972, p. 48)

   * Time and freedom to experiment and explore subjects of interest as well as new areas

   * Involvement of the higher cognitive and affective concepts and processes as defined by Bloom, Guilford, and Krathwohl (See Modules 3 and 4 in this series.)

   * Confrontation with problems and issues of society for which there is no single predetermined solution

     > Social concern has to become the context in which ALL studies are couched, or else gifted youth will be saddled with the question of , 'Knowledge FOR WHAT?'
     > Tannenbaum (1972, p. 12)

   * Open access to needed learning resources whatever and wherever they may be ("Grade level" is largely irrelevant for the gifted/talented who can cope with materials of a difficulty two to four or more levels higher than grade placement if the subject is of interest to them.)

   * Wide variety of in-depth cultural experiences

   * Opportunities to work with adults and to help others

   * Introduction to their own abilities (Many gifted/talented young people have never known they were unusual in any way

until someone helped them to discover their abilities.)

* Opportunities to develop creativity (The intellectually and academically gifted often believe they are not creative at all. They have concentrated - often not by choice - on content areas with little or no chance to try their wings in art, music, dramatics, dancing... and fear to attempt activities in any of these areas lest their efforts prove to be inferior to those of others.)

* Rapid advancement to other levels of difficulty as soon as the necessary competence in particular areas has been demonstrated. (Hollingworth has noted that the bright child learns in HALF of the time allotted to development of a given concept or skill, while the exceptionally able require ONE-FOURTH as much time as that needed by the average student.)

2. ANSWERS WILL VARY. However, underlined key words or their equivalents in meaning should be included.

Instead of detailed curriculum guides, a broad frame of reference is recommended for bright children (Martinson, 1968) with topics related to the interests of individuals. In an article dated 1972, Martinson suggests as topics:

* Biography (e.g., identifying common elements of greatness through reading several biographies from a bibliography)

* Insects (guided by the questions, Do insects depend on man more than man depends on insects? What if there were no insects?)

* Ecology

* Space exploration (guided by such questions as Who faced the greater difficulties - James Cook or space explorers? Were any of their problems common to all explorers?)

Martinson also suggests that teachers may find content in their own reading about which to pose questions that will intrigue children of high ability.

In line with Martinson, Milton J. Gold (1965) points out that unit organization makes individual learning at a suitable pace and depth more feasible than just "covering" masses of details and facts and urges that learning experiences in different subjects be integrated.

Elizabeth Monroe Drews (1968) hints at her viewpoint in the title of

an article, "Beyond Curriculum." Her approach is "to focus on the creative growth of the self and the synergic relationship of the individual with society." She uses the term synergy to refer to an ideal which "would be a culture in which the interests of each would be developed in behalf of the interest of all." As specifics, she describes the following as meaningful topics:

* Cultivation of Self-Awareness, Positive Self-Regard and Self-Transcendence
* Development of Social Conscience and Engagement in Pro-Social Action
* Encouragement of Aesthetic Appreciation and Expression
* Development of a Philosophy of Life
* World as Setting and Curriculum

She italicizes this idea: "The creative, intellectual and ethical growth of the individual will be greater if many kinds of resources are provided which stimulate the desire to learn rather than a detailed, step-by-step curriculum."

According to Gold, "Flexibility rather than uniformity should characterize the curriculum " (p. 147). "Balance and breadth are essential ingredients in the curriculum of the gifted." He is strongly opposed to an excess of prescribed activities.

Hilda Taba (1963) would replace the current concept of "coverage" with a focus on fundamental ideas "while judiciously sampling the detail with which to develop these ideas." (p. 187).

James Gallagher has commented (1964, 1971, p. 78), " Surely, our educational system has more to offer the gifted student than the prospect of becoming an academic sponge, sopping up facts that pour out when he is squeezed." He favors providing content with greater stress on "advanced conceptualizations and important ideas not easily grasped by average or below average students" and helping gifted students develop learning styles that will help them in later studies or in life.

Virgil Ward (1961) has suggested looking at the major areas of content - humanities, social sciences, natural sciences, and mathematics - to see HOW MAN HAS REACTED TO MAN (history, anthropology, literature...) AND HOW MAN MAY OR SHOULD IN THE FUTURE REACT TO MAN (government, law, philosophy, ethics). This kind of topic or unit could well form the foundation for a complete program, with different levels of study and discussion with different ability levels, the topics

serving nicely as a unifying force in articulation between levels of development. This kind of approach forms a program "core" appropriate for various levels of intellectual functioning. It could be expanded at some point to include a study of man

...as scientist
...as mathematician
...as sociologist
...as anthropologist
...as economist
...as communicator
...as musician
...as artist

... as (add your own)

THE WORLD OF TOMORROW is another pivotal peg on which the curriculum can swing, spreading outward from lower to higher levels as a weighted string suspended from a pole swings out farther and farther in widening circles.

Much concern has been expressed by experts in gifted child education that the gifted/talented be involved in a lengthy, serious study of the future so that they can become "problem finders," recognizing problems far enough ahead of their arrival so that plans can be developed judiciously, not hastily improvised when the problem has become a crisis.

Stressing how to learn with the higher levels of thinking indicated by the taxonomies of educational objectives (See Module 3.) and by the Structure of Intellect model, along with approaches to developing creativity (See Module 4.) is recommended again and again by leaders in gifted child education.

3. ANY 5:

Once a program has been determined, a system for scheduling students into it must be considered. Should all students of like ability be grouped for particular studies or part of the day? Should third-grade students who can handle fifth-grade content with ease be advanced to work with that group - or be given opportunity for independent study instead of working on assignments they do not need because they have already mastered whatever those assignments are designed to accomplish? There are many prototypes (models) for the purpose of organizing gifted children for worthwhile learning experiences. A sampling includes the following:

Ungraded classes
Multi-age classes
Special schools
Special classes
Minicourses
Special interest clubs
Resource center
Independent study
Correspondence courses
Credit by examination
Seminars
Mentor or tutor

IV. Activities

1. Using the philosophy of gifted child education developed for Pre-assessment, Number 12, page 7, establish at least 3 goals and 6 appropriate objectives to meet the needs of your students, including the variety of gifts discovered among them and not forgetting those of students from minority backgrounds, low socio-economic families, and the handicapped.

   Goals should be stated in general terms, but objectives should be phrased with precision and should represent a balance of personal, social, and educational considerations which actually reflect the needs and interests of the entire gifted population.

2. When you have completed Number 1 above, compare your statements with those on the following pages. Adjust your goals and/or objectives to clearly reflect consideration of your gifted/talented.

3. "Confluent education sees some of the primary purposes of schooling as helping individuals to build meaningful lives as well as to develop occupational and intellectual skills," state the authors of "Getting It All Together: Confluent Education." More and more is being written about confluent education; that is, linking the affective and cognitive domains. Read the booklet (in the kit) and determine whether this approach would work in your school/district with your gifted/talented students.

4. If the concept of confluent education as an approach to programing for the gifted/talented appeals to you, read the booklet, "Affective Edu-

(continued on page 41)

2. GOALS

Milton J. Gold (1965, p. 145):

1 Development of independence, originality, and a desire for creative expression

2. Encouragement of initiative in solution of problems

3. Provision of opportunities for expressive activities

Fontana Unified School District, California

1. To identify at every level and in every school those who are gifted

2. To understand the abilities and needs of each gifted child

3. To provide the educational program which will enable each gifted child to develop his abilities to the fullest potential

4. To prepare mentally gifted minors for responsible and productive adult roles

5. To help each participating gifted child gain a realistic and healthy concept of himself - his strengths, weaknesses, areas of needed improvement, and potentialities

6. To develop gifted children into intellectually and creatively capable, productive, and compassionate human beings.

Inglewood Unified School District, California

1. To unleash the student's rate of learning and level of achievement

2. To provide learning alternatives which are appropriately styled to encourage individual growth at varying levels of abilities, interests, and needs

3. To expose the student to wider and farther intellectual horizons which can be pursued throughout his learning career.

4. To develop each student's ability to recognize, integrate, and utilize his potential in order to become a self-actualizing individual

(continued)

(Inglewood Unified School District Goals - continued)

5. To encourage the becoming of an individual while developing responsibility for self and society

6. To emphasize individual success and excellence in academic, social, and physical realms.

OBJECTIVES

Academic Achievement (Newhall School District, California)

1. Each gifted student will demonstrate growth in academic achievement and skills commensurate with his anticipated achievement in each subject area.

2. Each student identified as underachieving in either reading or math will demonstrate growth which is sufficient to reduce the deficit between anticipated and actual achievement in each subject area by 40% each year.

Thinking Skills (Newhall School District, California)

Each student will demonstrate growth in critical thinking by writing statements illustrative of his critical thinking skills and by improving 20% per year in performance on an appropriate test of critical thinking.

Thinking Skills (San Joaquin Elementary School District, California)

Each child will increase in his ability to summarize by distinguishing the significant from the insignificant, distinguishing the relevant from the irrelevant, drawing conclusions or making estimates or predictions from information.

Independence and Study Skills

1. Orange Unified School District, California - Given opportunities in an enriched program to explore his own individuality, the student will be able to identify accurately, in self-appraisal essays and ratings evaluated by teachers and counselors, areas of personal strengths and weaknesses, improvements made, and major interests and talents.

2. Inglewood Unified School District, California - Upon completion of an independent or group-studied topic or activity, the student will improve in his ability to demonstrate ability in at least two of the areas relative to his level or

need:

... identifying, acquiring, recalling information
... interpreting, translating information
... organizing, classifying, analyzing information
... comparing, contrasting information
... judging, validating, assessing information

evidenced by district-constructed pre- and post-survey of skills

evaluation of student's independent study log

assessment of products according to a district criteria checklist.

(All California school goals and objectives adapted from PROVIDING PROGRAMS FOR THE GIFTED AND TALENTED, by Sandra Kaplan.)

For additional examples of either goals or objectives, refer to the book by Kaplan (in the kit).

---

4. (continued from page 38)

cation in Philadelphia" (in the kit). If this is not of concern to you, keep the pamphlet in mind to recommend to your staff for the good ideas in it.

5. Calvin W. Taylor of the University of Utah developed a multiple talent approach to programing. In an article, "Cultivating New Talents: A Way to Reach the Educationally Deprived," he compares the old-fashioned way of mining for copper with the modern way, pointing out how much of the material formerly considered to be waste products is now recognized by engineers as rare and precious metals. He poses the question, "Are we in our schools "dumping" valuable human resources because we are not

alert to the varieties of talents needed in our present and future society?" He recommends programing to develop six dimensions of talent: academic, creative, planning, communicating, forecasting, and decision-making. He indicates that star performers emerge from almost all levels of the talent ladder, that if at least the six different types of giftedness are cultivated, about 30% of the student population will be found to be gifted in one or more areas.

The Mobile County Public Schools Division of Curriculum and Instruction created a talent activity packet based on Taylor's ideas entitled TALENTS UNLIMITED, a cooperative effort which was designed for the elementary level but which can also be continued into advanced levels. This was cited as an examplary project by the National Diffusion Network of the U.S. Office of Education and has been adopted by a number of school systems. (A copy of TALENTS UNLIMITED may be borrowed from the CITE Consultant or the consultant for the gifted/talented at your Education Service Center.)

Read the little booklet, "Classroom Cue Cards for Cultivating Multiple Talent" (in the kit) to see how this project works. If this approach to serving the gifted/talented does not appeal to you, keep Eberle's booklet in mind to recommend to your staff for the good ideas in it.

6. Read the summary, Descriptions of Prototypes (based on Syphers, Doob, and Kaplan), for an overview of the major types of administrative arrangements.

Description of Prototypes

Most scheduling arrangements for gifted programs can be classi-

fied in three categories: acceleration, grouping, and independent study. Occasionally, two or even all three categories may be overlapped, depending on the particular purpose, emphasis, and structure.

Acceleration

Allowing pupils to progress at their own rate is not a privilege, but a widely applauded requirement in programs for the disabled or disadvantaged pupil. Yet it is not extended to the education of the gifted and talented who may need it most. Opposition to acceleration is usually based on a concern for social and emotional adjustment and on individual cases of students for whom acceleration was inadvisable. The misconception often prevails that the child who is gifted or talented is bound to be deficient in the area of personal adjustment. NUMEROUS RESEARCH STUDIES HAVE PROVED THIS TO BE UNTRUE FOR THE LARGE MAJORITY OF GIFTED STUDENTS.

Accelerated students finish their schooling sooner; thus, they become independent, productive adults sooner with resulting advantages to the individual and society. (School personnel often oppose acceleration for the very reason that if the student leaves school earlier, the money allotted for his/her attendance is lost. Is this sufficient reason to deny the opportunity to the students concerned? If they drop out, the money is lost anyway, but if the early-to-college scholar graduates earlier, he/she begins paying school taxes sooner!)

Acceleration - which is defined as any provision that allows a student to complete a given set of courses in less than usual -

can take many forms.

Early admission. Most school districts have followed the custom of using an arbitrarily set chronological age as the requirement for entering kindergarten or first grade. This policy, by assuming that the relationship between chronological age and mental and emotional maturity is the same for all children, penalizes the exceptional child. Many gifted youngsters are ready for first grade, NOT kindergarten, as early as age 3, certainly by 4. Many of these children have already taught themselves to read and are understandably frustrated and bored when they are forced to go through the usual reading readiness activities and basal readers.

In short, the gifted child, in being denied early admission, is first held back and then stifled by the inflexibility of the school system. Educational opportunity can come too late as well as too early in a child's life. Not only the mind but the personality can be crippled by such neglect.

Because social and emotional maturity are more closely related to mental age than to chronological age, gifted children are generally better adjusted than the average children. Research has shown that early admission promotes personal as well as intellectual development.

A study by Braga (1971) revealed how teachers' attitudes toward early admission are based on prejudices rather than fact. Without being told that they were taking part in a study of early admission, a group of teachers opposed to this practice were asked to evaluate

the children in their classes concerning work habits, problem-solving abilities, physical, social, and emotional development, and academic achievement. The classes contained randomly selected pupils admitted at the usual age as well as pupils who were admitted early but who were in no way identified as early entrants. The teachers, however, reported that the early entrants (not knowing that's what they were) were as capable as the other group in all areas!

Principals and other administrators, like teachers, have not supported early admission. A poll conducted by Nation's Schools showed that although 50% of the country's superintendents favored a policy of admission based on mental, physical, social, and emotional maturity, these superintendents continue to rely on chronological age as their sole criterion for admission. (Braga, 1971) Even where early admission is in effect, the number of children exempted from the usual age requirement is so small that the provision cannot be considered a major effort on behalf of the gifted and talented. Nebraska, for example, has had a policy of early admission for many years; yet the average number of early entrants approved in the state each year is only 750 for all 3,000 school districts, or an average of only 4 children per district.

An effective policy of early admissions depends on

a. a principal who believes in its value and is willing to educate teachers and parents about its benefits

and b. multiple screening procedures that benefit a reasonable

number of children, including the disadvantaged. Early admission is one of the most important ways of providing for the gifted because it encourages early identification and, presumably, continuing support.

Grade skipping. Many mentally gifted students can be moved ahead by one or even two grades. This is usually done most successfully during the first three grades, during junior high, and/or during the last two years of high school. Skipping is a useful, uncomplicated, and economical option for the child academically gifted in many subjects. However, it does not represent an effort to provide differentiated learning in terms of greater depth and opportunities for learning experiences demanding higher cognitive processes unless enrichment is provided.

Ungraded primary. This arrangement allows gifted children to progress at their own speed and to complete the primary program in less time than average children. In first, second, and third grades children work at their own rates and their own levels of ability in the various subjects and then move on to a regular fourth-grade when they are ready. This approach is ideal for gifted pupils who are very strong in certain areas and average or even weak in others. It can also represent an efficient use of personnel and facilities: many ungraded classrooms are taught by a team of teachers in rooms that accommodate larger numbers of children.

Telescoping junior high. Wherever the function of junior high is merely a review of elementary subjects and preparation for senior high,

the gifted student is likely to feel thwarted. Programs which reduce three years of study to two have been successfully implemented, and in this area there appear to be many possibilities for innovation. In some cases, telescoping has included the entire range of subjects, permitting the student to enter high school earlier. In other cases, the telescoping has been confined to particular areas of aptitude, such as mathematics, science, English, or a foreign language. This means that the student remains in junior high but fulfills certain high school requirements a year early.

Advanced Placement. Allowing gifted/talented college-bound students to take college level courses while still in high school has proved to be a successful plan. Cooperating colleges may grant credit and/or advanced standing to qualifying students, thereby reducing basic requirements or the number of years spent at the undergraduate level in college. Most important of the benefits is the stimulus of challenging work in high school, especially in the senior year when many bright seniors feel that their time is wasted.

Through the Advanced Placement program, which is coordinated by the College Entrance Examination Board, students who are superior in one or more subjects can pursue college-level work in a variety of ways. They can take existing high school courses that have been upgraded to meet AP standards. Or they can supplement regular courses with AP seminars, tutorials, independent study, or even correspondence courses.

An AP program in a high school can serve a few students or many, in only a few subjects or in the full 13 available. But despite its

flexibility and low-cost administration, it is familiar to too few principals and counselors. In 1976 only 9% of the high schools in Texas had an AP program, compared to 41% in Utah and more in other states.

Grouping

Grouping is usually an important approach in programs for the gifted/talented, not only because it allows differentiated learning experiences, but also because it fulfills the need of superior pupils to form healthy self-images by being with others who share their interests and capabilities. As Benjamin Fine (1964) has pointed out, it is as ridiculous to expect a bright child to function effectively in an average group as it is to expect a mentally retarded child to do so. We somehow manage to recognize one fact but deny the other. It should also be stressed that grouping can still provide contact between the gifted group and their other schoolmates in physical education classes, in shop and home economics, in class parties and picnics, etc.

Fears of "elitism" are dispelled when the one bright student in the class returns from the gifted group suddenly aware that he/she is no longer the "smartest" kid in school; grouping develops humility as individuals discover they are not necessarily the smartest kid in school when up against others. Meanwhile, the students "left behind" begin to ask questions, to volunteer, even to blossom with abilities hidden for fear of ridicule by "the brain." Teachers who claim they need the bright students to "spark" and encourage the others are much

mistaken because the bright students send the others into passive states of indifference. What the teachers too often mean is that they have at least one student who can answer their questions. (Maybe they are not asking the right questions?)

Grouping alone, however, is not enough. The child is not likely to benefit from a special group unless the arrangement is accompanied by important curriculum modifications and qualitatively different learning experiences.

Special schools. Special schools for the gifted, representing the extreme of the grouping approach, is not a realistic option for most school districts. However, it is worth including here because principals and counselors should know about the existence of these schools, particularly to guide parents who may wish to move to a location where their children can benefit from such schools. Often enrollment in a special school is the best way to serve the needs of the very gifted or talented. Many of the schools offer some partial or full tuition scholarships and encourage a multi-ethnic student body.

Special classes, programs, workshops, or seminars. Special classes can take the form of full- or half-day sessions that meet every day, several times a week, or only once a week. Thus, gifted students may be separated from other students for the entire school day, for all academic subjects, or for only a few hours in certain subjects. Sometimes special classes are held after school, in the evening, or on Saturdays to provide special instruction. The gifted/talented do not resent extended school days as do students who must take reme-

dial work after school.

Special groupings of these types appear to be most effective if scheduled over large time blocks to give gifted children the opportunity to delve into issues and problems without interruptions from restrictive time schedules.

In smaller or less populated districts, the number of exceptional students in one school may prove too small for special classes. Here special programs or seminars - either on weekends or during the summer - can bring together gifted pupils from several communities periodically for advanced instruction and extracurricular learning opportunities not possible in the regular school day. Talented members of the community can be involved in this kind of arrangement, even professors or graduate students from a college or university who might be persuaded to spend the weekend with a family in the community where the students are to meet.

Cluster grouping. Through this arrangement, the gifted group within a heterogeneous class pursues special projects and advanced, in-depth study within the setting of the regular classroom. Clustering has been a popular approach because it requires minimal administration, being largely a matter of teachers' developing or accumulating appropriate materials and guiding activities. Too often, however, only a handful of dedicated, resourceful teachers assume the task of providing for the needs of their gifted pupils. Other equally or even more gifted/talented students whose teachers do not make the effort to provide different, more challenging materials and assignments, are

even more aware of being ignored, "unwanted." Wherever clustering is used, it should be treated as a formal program element subject to the same careful planning and evaluation as any other type of organization. Removing students from those classes in which the teachers are not providing the necessary challenges and resched-- uling them with teachers who are interested in stimulating the gifted/ talented to their very best efforts should be done routinely as soon as teachers are discovered who are for whatever reason failing to meet the needs of the gifted/talented students in their classes. NOT EVERY TEACHER IS SUITED BY TEMPERAMENT, TRAINING, OR EXPERIENCES TO WORKING WITH GIFTED/TALENTED STUDENTS.

Resource teachers. Teachers and other professionals with specialized knowledge and abilities may be used to serve special classes for the gifted at different schools one or more times each week. These teachers may supply special materials, such as learning kits and portable resource centers. They may also advise regular teachers in the areas of curriculum planning for the gifted/talented.

Summer school. Although in most schools, summer sessions are only for remedial work or make-up courses, summer is an ideal time to provide opportunities for the gifted/talented. In schools with the traditional grade levels, special summer programs have been used successfully to compress a full year's curriculum - allowing, for example, second-graders to spend the summer studying third-grade material and to enter fourth grade in the fall. This arrangement is reassuring to both parents and teachers who are concerned with possible gaps in factual

information or specific skills which grade-skipping might cause. Holding summer school for gifted/talented students can bring together children from several schools in an area to form a class. The relaxed atmosphere of a summer program lends itself to learning opportunities that are not usually a part of the regular program. Summer programs for older children can offer specialized study with experts in particular fields of interest, such as resident artists, poets, musicians...

Independent Study

As an alternative or supplement to acceleration and grouping, the needs and interests of gifted students can often be satisfied through some form of independent study. This term refers to any arrangement that permits the pupil to work on an independent basis with the support of an adult (although gifted students in the upper grades have served successfully as mentors or tutors for gifted children in lower grades, especially primary). Though the arrangements may be very loose, provisions should exist for communication between the school, the pupil, and the source of guidance as well as for evaluation of the plan's success.

Mentor, tutor, or sponsor. The individual assigned to work with the student may be any teacher, librarian, or community member who can provide special expertise in a particular area. The mentor approach is especially recommended for creatively gifted or disadvantaged students, but it is suitable for any type of gifted individual. A spe-

cial advantage is that it involves community members in the educational process and thus helps to form a broad base of support for the program. A student assigned to a mentor is often released from a certain amount of school time to prevent an overloaded schedule.

Internships. This concept provides enrichment, career exploration, and on-the-job training for older gifted/talented students. An intern can be assigned to any cooperating company, organization, institution, agency, or professional (e.g., veterinarian, dentist, attorney) in the vicinity relevant to the student's special interest who is willing to work with the student. Not confined to business and industry, internships can be created in government, civic affairs, the creative and performing arts, social service and health agencies, and education. In some communities arrangements can be made that involve an exchange of services and thus no additional cost to the school.

Resource centers. These can be established at any grade level as a means of encouraging independent study. With the guidance of a teacher, librarian, or other professional, the gifted child can pursue special interests to a greater degree than is usually possible in a regular classroom program. The resource center may encourage intensive reading or the production of original works and projects.

- Alison Heinemann

7. Examine the descriptions of individual organizational models described in Kaplan's PROVIDING PROGRAMS FOR THE GIFTED AND TALENTED (in the kit). Consider each for its appropriateness to your school/district

in terms of the needs and interests of the gifted population, the availability of resources, and its compatibility with the existing school structure. Also the feasibility of combining different options for maximum effectiveness. Use the information on pages 57 and 65 in Kaplan's book as a kind of checklist.

8. Reading about what can be done is all very well - and a necessary first step to acquire a perspective on all the various possibilities for identifying the best organizational arrangements for the local situation. But at some point seeing programs in action is desirable. On the next page descriptions of what is happening in some Texas schools illustrate how different prototypes are working.
   Make arrangements to visit those schools of special interest to observe programs for the gifted/talented in action. (See pp. 55-59.)
9. Certain states have long been distinguished by their programs for the gifted and talented. Again, a variety of administrative arrangements are represented. Read about what is happening outside of Texas. Phone or write for further information about the programs of special interest. If possible, arrange to visit one or more. (See page 59 A.)
10. A number of special opportunities for the gifted are available but overlooked by some school personnel, especially if these do not relate to athletics. Investigate the numerous activities of the University Interscholastic League (University of Texas at Austin). Order a copy of CONSTITUTION AND CONTEST RULES OF THE UNIVERSITY INTERSCHOLASTIC LEAGUE, University of Texas, Austin. Also find out what the Texas Forensic Association and National Forensic League

sponsor, what opportunities are offered by the Texas Music Educators Association and the University of Texas String Project. Check out private groups like the Gifted Youth International, located in Austin, which in 1978 sponsored a six-week summer seminar for 120 intellectually gifted boys and girls who would enter ninth grade in the fall to live on campus at St. Mary's University in San Antonio and study in the areas of science, politics/economics, and literature with gifted teachers. Another such group is Gifted Students Foundation based in Arlington. In 1976 a Career Awareness session for students 12 through 15 years of age was held on the campus of the University of Michigan during June and July. Another program, Career Exploration, open to students from 12 through 15 years of age, and from 16 through 18, was held at Bauder College in Arlington with graduate credit available for teacher interns through the University of Texas at Dallas. A very exciting program for students 16 and over, teachers, and counselors was scheduled for July and part of August in Guadalajara, Mexico, with lodging in Mexican families.

PROGRAMS IN SOME TEXAS SCHOOLS

Within recent years Texas schools have begun to develop programs for the gifted/talented. Most of these have been funded by Title IV C or other federal moneys.

(continued)

Special school. In 1971 the High School for Performing and Visual Arts was established, one of fewer than half a dozen high schools for arts in the nation. (Ray, p. 34) It emphasizes preparation for employment after graduation while at the same time developing talents further.

In 1972 a pilot program called Vanguard was begun at River Oaks Elementary School with 300 students from Grades 4 through 6 and a faculty of 12,operating in three teams: humanities, exact sciences, and communications. The program was nongraded and had full-time specialists for art/music, science, and physical education. The program has since expanded to include K through 12 with several elementary schools, three junior high schools, and one senior high school. Vanguard provides examples of (1) ability grouping within a classroom, (2) enrichment, (3) independent study, (4) acceleration, and (5) team teaching, for each school is largely autonomous.

Another school district with a separate school for the gifted/talented is located in Corpus Christi. The Athena Program at Windsor Park Elementary School stresses art, music, and Spanish as a second language. The parents of the children at Windsor Park have been so pleased with the program that they wished to participate and established two-hour periods on Fridays for special activities directed by the parents themselves. The children have participated in two different activities every six weeks from such self-selected areas as tumbling, cooking, ukelele,

macrame, papier mache, knitting, and karate among others. In sixth-grade math and language arts, vertical enrichment is also an option for students to advance to higher levels according to their abilities.

Special class. In Nederland a creative arts program for the academically gifted in Grades 3, 4, and 5 is offered. Three teachers rotate while the principal and counselors substitute in the classroom to release them. Community residents also participate. The emphasis is on problem-solving and creativity. Twice a week for 40-minute periods students engage in brainstorming, values clarification activities, quiltmaking, painting, writing plays and poetry, and studying mythology.

Resource room. At College Station, academically gifted students in elementary or middle school go to a resource room for language arts and mathematics. A special resource teacher alternates with the regular classroom teachers on three campuses. Emphasis is on the higher thinking skills, logical reasoning, creativity, research, and communication.

Cluster grouping and seminars. Amarillo, which has the only consistent program operating throughout nine schools, features cluster grouping within grade levels according to ability, weekly afternoon seminars on current events, contract work, elective courses, and a special type of career education, "A Day Out with Dad," with children celebrating their birthdays by spending a day beside their fathers at work observing and,in many cases, being given

specific tasks within their abilities.

Independent study. Wichita Falls offers qualified junior high and high school students opportunities for in-depth study in chosen fields of math and/or science. Students work independently and also in cooperation with equally qualified students having similar interests. They may use regularly scheduled math and/or science class time, study periods, and/or before-and-after school time as they please in the laboratory or library and/or in any mathematics/science classes. In addition, students are free to study more than one course in their chosen field simultaneously for credit upon completion of comprehensive written and oral examinations. Students may progress beyond the high school curriculum for chosen disciplines.

Advanced Placement. These advanced courses developed by the College Entrance Examination Board and made available to high school students throughout the nation are offered in Dallas, Houston, and in several other schools. Thirteen courses are provided, including one in art and another in music. A student may earn from 3 to 36 semester hours of college credit as well as high school credit. Some students take several AP courses.

Major works classes. Highland Park High School outside Dallas schedules major works classes in English, mathematics, biology, chemistry, physics, French, Latin, and Spanish. The courses require extra reading, writing, and study and are only for the academically/intellectually able.

Summer classes. Denton ISD and Andrews ISD both have special summer programs for the gifted/talented. At Denton students in Grades 5 and 6 engage in activities in music, drama, fine arts, science, and history in cooperation with North Texas State University. The Andrews program for seventh and eighth-graders provides opportunities for critical thinking and creative expression.

Multiple talents program. Temple ISD has been using TALENTS UNLIMITED, the material developed along the lines of the six talents mentioned by Calvin Taylor and described on page 44 in the module.

Internships. Dallas, Houston, and Austin have been operating internship programs for upper level high school students to participate in the daily work of professionals, businessmen, and individuals in other careers for a semester in lieu of the regular program during that time.

This is merely a sampling of what is happening in Texas for the gifted/talented. Other schools also offer special provisions for this group of students. Nancy Thornberry, a doctoral candidate at Texas A & M University, surveyed and reported on programs for her dissertation, a copy of which has been submitted to Ms. Ann G. Shaw, Program Director/Gifted and Talented Students, at Texas Education Agency.

OUT-OF-STATE SITES WITH SPECIAL PROGRAMS

FOR THE GIFTED/TALENTED

There are many and,again, those listed below are only a sampling. Dr. Dorothy Sisk, Director, Office of the Gifted and Talented, USOE, Donohoe Building, Rm. 3827, 6th and D St.,SW - Washington, DC 20202, can provide a list or answer questions.

CALIFORNIA 92101	San Diego City Schools (highly regarded for its variety of very good programs)
CONNECTICUT	Educational Center for the Arts, New Haven 06510
	Talcott Mt. Science Center (very interesting separate school which accepts students from all Connecticut schools) Donald P. LaSalle, Director
FLORIDA	Talent Development Program - Dade County
GEORGIA	Living Classroom (near Okefenokee Swamp Park) (9 schools with half rural families termed poverty cases) Okefenokee Cooperative Educational Services Area Route 3, P.O. Box 406, Waycross, GA 31501
	Governor's Honors Program (probably the longest summer program on a university campus, has many interesting activities) Contact: State Department of Education, Office of Instructional Services
IDAHO	Coeur d'Alene (project for rural pre-school) Contact: Gail Hanninen, Sunburst Preschool, Coeur d'Alene 83814
LOUISIANA	New Orleans Center for Creative Arts (New Orleans, 70113)
NORTH CAROLINA	Governor's Honors Program (another summer program) Winston-Salem 27101
NEW YORK	Integrated Arts Project, Utica School District, 310 Bleecher St., Utica, NY 13501
	Science and Arts Camp, Port Ewen, NY 12466 (Another camp of interest is the Wye Center for Creative Writing, Queenstown, MD)
PENNSYLVANIA	Bucks County High School Science Seminars, Bucks County School District, Doylestown, PA
	Pennsylvania Governor's School for the Arts

STEP FOUR: SELECTING TEACHERS AND PLANNING STAFF DEVELOPMENT

GOALS: To discover the traits which are shared by successful teachers of the gifted/talented and to meet a variety of needs for staff development.

I. Enabling Objectives

Upon completion of this part of the module, you will be able to

1. Identify among your employees or candidates for positions the teacher(s) whose temperament, training, and experience are likely to be most effective working with the gifted/talented.
2. Select appropriate measures to determine attitudes and needs of all school personnel for staff development, both pre-service and in-service.
3. Plan an on-going program of staff development suited to both those who will be working with the gifted/talented and those who will not.

II. Rationale

> Potentially fruitful educational programs well conceived by "front office personnel have been essentially unproductive when they have been poorly or inadequately comprehended by teachers.
>
> - T. Ernest Newland (pp, 207, 208)

Many a fine educational program has floundered and failed because teachers were not involved in the planning staqes. Inasmuch as teachers implement a program on a daily basis, administrators need their support as much as that of the community. The authority to tell teachers what they are to do is not enough. Unless teachers fully understand the need and purpose and unless they are convinced of the values of a particular program, their cooperation will be strictly perfunctory, their involvement minimal. The teaching staff must be partners with administrators, parents, and other members of the community from initial planning all the way through final evaluation.

For a continuing and productive program for the gifted, few decisions are more critical than the selection of teachers (Syphers, 1972), for the teacher is the key figure in education of the gifted. He/she is not only the mentor but the model of intellectual interest and intellectual achievement. His/her role is NOT to convey information but to stimulate interests, and develop high standards of achievement and social concern (Gold, 1965,p.148). "Observing and listening, supporting and extending, selecting and planning" (Gold, 1965, p. 1965, p. 196) are the functions of the person who teaches

the gifted.

> Teachers must themselves be students to keep up with their charges. Educators working with the gifted ought to be secure and stable individuals who can react positively to the mental probes of their students. They should have a sense of humor and above all enjoy and like the youngsters they are teaching and be able to revel in their achievements. (Impellizeri and others, 1976)

Not all teachers are comfortable working with gifted children. They feel threatened by knowledgeable, inquisitive students.

> Most teachers find those students easiest to teach who are underachieving, conforming, and passively superior who have learned to accept the role of the "good" boy or girl: never disruptive, never challenging or questioning, never interrupting... (Fine, p. 106)

These same teachers are most bothered by students with wild and silly ideas whose best work is often off-beat and whose behavior is characterized by humor and playfulness. The teachers dislike of these students is revealed through open aggression and hostility, negative criticism, rejection and/or indifference and reduction of opportunities to learn by assigning busywork or imposing sanctions. (Torrance)

Selection of teachers for the program is a responsibility not to be taken lightly.

> The gifted child, as all children, needs to feel worthy as a person. He needs a teacher who responds to him, shares his interest, works with him, and recognizes his accomplishments. The teacher who tells him to go out and play instead of reading so much conveys disapproval of

> reading, and the teacher who informs him in front of the group that he shouldn't use such big words discourages vocabulary building and embarrasses the child. If placing a child with the proper persons means deliberate avoidance of a teacher who feels threatened by giftedness, so be it. Judicious matching of children and adults is productive both in classroom assignment and in contacts for special activities. (Martinson, 1972, p. 47)

There was a time administrators assumed any teacher could teach the gifted/talented. Teacher assignments were rotated so that every teacher would have a chance to teach the brighter students, especially where ability grouping was practiced. Often such assignments were made on the basis of seniority or reward for having somehow pleased the administration. Such practices are "reprehensible and indefensible" (Impelizzeri and others, 1976). There is still a tendency for some administrators who have been persuaded to establish programs for the gifted/talented to assign teachers with no background in working with these students and with little or no knowledge of their nature or needs. The senior author has received numerous pleas for asistance from teachers who have said, "My principal told me I'll be working with gifted students next year. I have no idea how to start. I don't even know much about the gifted. Will you help me?"

Instead of using a hit-or-miss approach to choosing one or more teachers to work with gifted/talented students, administrators need to consider the following about each prospect: his/her

* knowledge of the special characteristics and problems of the gifted/talented
* acceptance of and appreciation for giftedness

* certain personal characteristics necessary to cope with the greater amount of work involved and the greater variety and depth of interests and knowledge possessed by the gifted/talented

* eagerness (not just willingness) to work with the gifted/talented

* willingness to participate in as many training sessions as may be needed to prepare for the teaching assignment.

> They are early to school and often stay late; they have close contacts with books, libraries, laboratories; they give evidence of professional and scholarly eminence, producing things outside of school; they volunteer for work with the gifted; they have original ideas and try to carry them out; and their rooms are more stimulating than neat. (Gowan and Torrance, 1971)

Few teachers have been prepared by the schools of education to understand the gifted/talented or to work with them successfully. Consequently, careful, sequential plans must be made for pre-service orientation to a program for the gifted/talented, including its goals, its objectives, and the development of skills for teaching these students, and in-service activities to refine skills and consider ways to solve problems that have developed during the implementation of the program. Not only teachers, but also aides and counselors need to be given more information about educating the gifted. Counselors should know well those youngsters who are gifted. Where possible in larger schools, a particular counselor should be assigned to work with gifted students only, while in schools having just one counselor, he/she should devote a good percentage of time to counseling the gifted. (See Module 10.)

Whether the teachers chosen for the program are new recruits or mem-

bers of the present teaching staff, they should be employed for a summer program of personal growth. In addition, those teachers who will NOT be working directly with the gifted/talented should be included in some of the training sessions, partly to keep them informed of developments, partly to prepare them to become aware of students who should be recommended for special provisions and opportunities. During the course of training, administrators may find that the staff need help in areas not identified earlier. Provision should be made to incorporate these areas in the total program of teacher development.

Successful programs do not result from piecemeal approaches to teacher training and staff development any more than they do from haphazard approaches to providing for the needs of the target student population.

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

1. List the 5 most important characteristics a teacher of the gifted/talented should have.
2. List at least 5 topics which should be included in a pre-service or in-service program for staff development for newcomers to the program.
3. List 5 sources of help in directing or assisting with training sessions.

Turn to the next page for response sheet comparison.

GT # 9

PREASSESSMENT EVALUATION

1. Characteristics: ANSWERS WILL VARY. The following studies describe traits viewed from different perspectives. Any of those mentioned are acceptable.

Teachers who seem to influence students dents most have
a. ability to put self in another's shoes
b. ability to prize individuals, celebrate their uniqueness, <u>really</u> care about them
c. a sense of genuineness, ability to be self with both strengths and weaknesses exposed
d. a sense of trust between student and teacher
e. confidence in subject matter.

(Harold Lyon)

Superior teachers who have taught intellectually gifted children for several years:
a. The ability to foster in gifted pupils social responsibility, a desire to serve society, and a recognition of the worth of others
b. The ability to create an environment in which the gifted participate efficiently in group discussions and in wholesome social relations
c. The ability to develop a classroom atmosphere for gifted pupils that is conducive to good mental health
d. The ability to teach the gifted to use the problem-solving approach to learning and to apply this to independent study and research and to evaluate their own progress
e. A knowledge or understanding of the social and emotional problems that may be created for a gifted pupil due to his accelerated mental development
f. The ability to develop a flexible, individualized, enriching curriculum which is suited to the individual gifted pu-

pil's needs and which avoids identical, stereotyped demands. (Wilson, 1958, p. 364)

High school teachers considered successful by their gifted, high-achieving students:

a. Tend to be mature, experienced teachers
b. Are mentally superior themselves (Mean verbal score on Wechsler Adult Intelligence Scale: 128 with range from 117-148; mean grade point average on professional education courses and major academic courses: 3.0 and 3.5 on 4.0 system)
c. Have high achievement needs and evidence high achievement levels
d. Pursue literary and cultural interests.
e. Are student-centered in teaching approach
f. Possess favorable opinions of students
g. Are characterized by systematic and businesslike classroom behavior
h. Are well informed and enthusiastic about their subject matter
i. Encourage students to engage in independent study and thought
j. Prefer to teach gifted students
k. Favor special provisions for gifted (Bishop, 1967, p. 48)

Characteristics listed by established expert in gifted child education:

a. Good health and physical superiority
b. Versatility of interests
c. Creativeness and originality
d. Unusual proficiency in teaching subjects
e. Participating member of the community
f. Clear and consistent philosophy of education
g. Knowledge of theories of learning
h. Excellent sense of humor
i. Abundant physical energy (Gallagher, 1964, 1975, p. 312)

2. Topics: ANY 5

Definition of giftedness as expanded by Texas Education Code and Congressional legislation

Nature (characteristics) of the gifted/talented - what they are like, how they are different from other students

Measuring instruments for recognizing different kinds of giftedness

Needs (related to their characteristics) and problems

Identification of minority students, those from poor families, and students who are disabled (handicapped) whether physically or mentally

Understanding of underachievement as reflected by the gifted/talented

Understanding of what intelligence is and how it can best be encouraged to its fullest development

Understanding of what creativity is and how it can best be stimulated

Materials and their use

Ways gifted/talented can be helped through guidance and counseling

3. Sources for help: ANY 5

a. STAR POWER - program of 10 self-pacing, self-directed worktexts of which this is one; for individual self-study, group work, or workshop use
b. Regional Education Service Center consultants or other local consultants
c. Nationally recognized experts in the field of gifted child education (See page 32 A.)
d. Professors from local colleges/universities noted for their concern for the gifted/talented
e. Teachers who have successfully taught the gifted/talented in programs elsewhere
f. Members from the Texas Education Agency
g. Individuals from the community or state who have special expertise in working with the gifted
h. Representatives from the National/State Leadership Training Institute on Gifted/Talented

IV. Activities

1. What is the attitude of the majority of your teaching staff toward special provisions for the gifted/talented?
   Enthusiastic? Resentful? Accepting? Indifferent? Uncertain?
   Use the Wiener Attitude Scale on pp. 17, 18 in A GUIDE TOWARD BETTER TEACHING (in the kit).
2. Arrange for prospective teachers of the gifted to rate themselves on the Martinson-Wiener Rating Scale of Significant Behaviors in Teachers of the Gifted, pp. 20, 21 in the same book. Discuss ratings.
3. Arrange for candidates for positions as teacher or counselor of the gifted/talented to be interviewed by (a) gifted students and (2) parents of gifted students (not necessarily the same students.) Compare reactions of the two groups to the same individuals.
4. Read the introduction and rationale (pages 7-13) in COMMUNITY INVOLVEMENT FOR CLASSROOM TEACHERS (in the kit) and skim other sections. Consider use of the material in training sessions.
5. Read pages 29-52 on in-service training models in TRAINING TEACHERS FOR THE GIFTED AND TALENTED: A Comparison of Models (in the kit). Apply relevant information to your own plans.
6. Careful, advance planning for staff development programs that will offer a maximum of teacher involvement in stimulating, realistic experiences will enhance the chances for successful education of the gifted/talented.
   Design a meaningful, relevant program of staff development activities for pre-service and in-service training. List the topics and indi-

cate the persons responsible for presentations or activities which will be most beneficial for attendees. Provide options for different learning styles and areas of need.

7. You may have to assess the extent of teacher training your staff will require. The needs of teachers who have already been teaching gifted students successfully for several years may be less pressing than the needs of novices or those whose first year in the program may have left them with many questions and who may find "refresher" sessions more helpful, perhaps, than were the previous sessions when the teachers had so much to learn in a comparatively little time. Determine from a survey the topics which your teachers feel they need most.

A word to the wise:

> Inservice experiences should be continuous, but varied. Some useful approaches are process-oriented information sessions; films, videotapes, and/or audiotapes with interaction sessions; micro-teaching; intra- and extra-district visitations; conferences outside the district; a core library; publishers' representatives' presentations and displays; and rap sessions among teachers, administrators, guidance personnel, educators, parents, and experts in the performing arts field.
>
> ...Plans for such continuing education should include objectives, responsibilities, expected outcomes, and some type of mechanism for evaluation. It is important to remember that full-time educators appreciate released time scheduling. Their appreciation directly affects enthusiasm, participation, and promotion of the concept.
>
> (Wolf and Others, pp. 22, 23)

STEP FIVE: EVALUATING THE PROGRAM

GI # 9

```
* * * * * * * * * * * * * * * * * * * * * * *
*  GOAL:  To keep track of how effective  *
*         the program is, both during     *
*         and at the end of it.           *
*                                         *
* * * * * * * * * * * * * * * * * * * * * * *
```

I. Enabling Objectives

Upon completion of this part of the module, you will be able to

1. Select the most effective methods to measure success in different areas.
2. Design a plan to evaluate your program for the gifted/talented that will enable you to spot needed changes while it is in progress and to determine the overall effectiveness of the program at the end of each school year.

II. Rationale

One of the most important - and too often ignored - aspects of planning any new program is EVALUATION, especially detailed evaluation that provides for an on-going effort. Continuing evaluation enables decision-makers to identify assets as well as gaps, also UNplanned and UNexpected factors which may be contributing to the failure or success of certain program elements.

"No program or provision for the gifted is so sacred that continuous assessment and evaluation is no longer needed," says A. Harry Passow(1972, p. 27). Gains should be measured in terms of the goals and objectives established for the program.

> Too often in education changes are made using one frame of reference, then someone else steps in - other administrators, parents, school board members - and the evaluations are made on the basis of stereotyped measurements. How much more? How much faster? How much higher on the standardized tests? Using a spelled out instrument such as the rating scale helps to maintain the original focus. (Syphers, 1972, p. 39)

The evaluation process must be carefully thought out in advance along with the planning of the program and a schedule prepared to ensure that it is carried out as specified. The plan should be comprehensive to provide an assessment of progress in all components of the project; e.g., instruction, community involvement, materials acquisition and/or development, staff development...

Gallagher (1960, pp. 60, 61) has outlined certain difficulties inher-

herent in designing evaluation for a gifted child program:

1. It is not possible to demonstrate the effectiveness of a given program by showing that the gifted children in the special group will score two, three, or four grade levels above their own chronological age on achievement tests.

2. It is not possible to prove the effectiveness of a program for the gifted by giving achievement tests before the program begins and after it is completed.

3. We cannot demonstrate the effectiveness of a program for gifted children by obtaining the opinions of people connected with the programs - i.e., teachers, parents, and children, when these opinions have not been supported by objective measures of some sort.

4. The benefits of a special program for gifted children will not be demonstrated by comparing these gifted children with the rest of the children at their grade level.

5. A program for gifted children cannot be adequately evaluated if measuring instruments are not adequate or appropriate to measure the unique nature of the program.

> Now, then, can a principal evaluate his program? He must consider all aspects of the program and the particular effect of each... Such an all-encompassing task will best be accomplished by a combination of objective and subjective methods. Reaction sheets with spaces for a point-scale rating, free expression answers, and suggestions and comments are useful tools in gathering student, teacher, and community feelings about the program... Perhaps the two most important factors which reflect the success of a program are the student's self-evaluation and the administrator's evaluation of the direction and continued growth of the program. (Gallagher)

EVALUATION CRITERIA LISTED BY TORRANCE

E. Paul Torrance shares his list of "elusive elements" of gif d programs and ways to evaluate them. ... The University of Georgia Professor recommends not getting "bogged down with too many criteria" from the list... but suggests three-to-five appropriate questions. The basic question, if answered, he added, is always the one which "will clean up the mess."

Does it prevent waste/conserve materials?

Will it bring about desired improvement/result?

Will it be acceptable?

Will it "explode in" people's minds?

Is it easy to understand/explain?

* Is it an improvement over what is presently done?

* Is it financially feasible?

Is it workable?

Is it only "cosmetic? and a "cover up" of the problem or will it correct the difficulty?

* Will it be short-term or lasting in effect?

* Will it cause a minimum of disruption?

* Is it ethically sound?

Will it produce results in the future?

* Is it compatible with existing knowledge/technology?

Will it take too many people to implement?

* Will it require more talent than is available?

Does it have potential for sustained success?

* Is it a deterrent rather than a cure?

* Will it generate more problems than it solves?

(From the Bulletin, July 1977, page 7, published by the National/State Leadership Training Institute on Gifted and Talented.)

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

List at least 7 different ways the program for the gifted/talented can be evaluated objectively during and at the end of the year. Include both objective measures and subjective measures, identifying each accordingly.

GT # 9

PREASSESSMENT EVALUATION

ANSWERS WILL VARY. However, they should be essentially the same as those listed and should not include any kinds of achievement tests. Remember: each type of measuring device should be identified as to whether it is Objective or Subjective.

Objective

1. Use of a Yes-No scorecard on which are listed the various components of the program with a point system assigned to scores
2. A checklist completed by everyone originally involved in the design of the program relating directly to the goals and objectives
3. Tape recordings of discussions and presentations for a comparison of a child's developing verbal fluency or vocabulary
4. Films or videotapes of performances, projects, etc.
5. Sociometric records of changing patterns of social relationships
6. Twice-a-year observations of the class by trained observers with pertinent checklists or rating scales

Subjective

1. Anecdotal records kept by the teacher
2. Logs or journals kept by students
3. Comments on parent questionnaires about children's attitudes, reactions to what is going on in the program, and apparently unmet needs
4. A self-evaluation essay or checklist by each student in the group
5. A checklist of each student's study habits and work skills

IV. Activities

1. Read Chapter 2 of Renzulli's A GUIDEBOOK FOR EVALUATING PROGRAMS FOR THE GIFTED AND TALENTED (in the kit). If you wish, skim the models described, but pay close attention to Section II: Basic Concepts in Program Evaluation.
2. Examine the Classroom Report of the Illinois Gifted Program (in the book mentioned in Number 1), noting types of reporting aids and kinds of information provided. Also consider individual items for possible use in your own evaluation process.
3. Review the Appendices beginning on page 113 in the same book and select instruments which might be appropriate for evaluation of your program for the gifted/talented.
4. Prepare a specific evaluation design and timeline to measure the effectiveness of your program at different times during the year. Remember: This should relate to the philosophy prepared for Preassessment, Number 12, page 7, and to the goals and objectives prepared for Activities, Number 1, page 38.

   NOTE: Use the EVALUATION CRITERIA on page 74 A as a checklist, especially the questions with asterisks beside them.

STEP SIX: FUNDING THE PROGRAM

GOAL: To discover ways to provide qualitatively differentiated education for the gifted/talented with little or no expense and ways to obtain funds for a program which requires support.

I. Enabling Objectives

Upon completion of this part of the module, you will be able to

1. List 5 ways to provide special educational opportunities for the gifted/talented at minimal cost.
2. Identify possible sources of funding.
3. Write a proposal according to Title IV C guidelines with the potential to be accepted.

II. Rationale

How much does a program for the gifted/talented cost? The question as asked is impossible to answer. What kind of program? How many students are involved? In what community? In what state?

In the survey completed by Rossmiller, Hale, and Frohreich in 1970, special programs for the gifted student proved to cost less than $100 per student over the average expense whereas, as the chart below indicates, all other areas of exceptionality except speech handicapped and the homebound/hospitalized required from 6 to 19 times as much. No one denies that the education of handicapped students should receive as much financial assistance as possible, but as Verna Tomasson says, "America is a Scrooge when it comes to spending money on its future leaders and professionals."

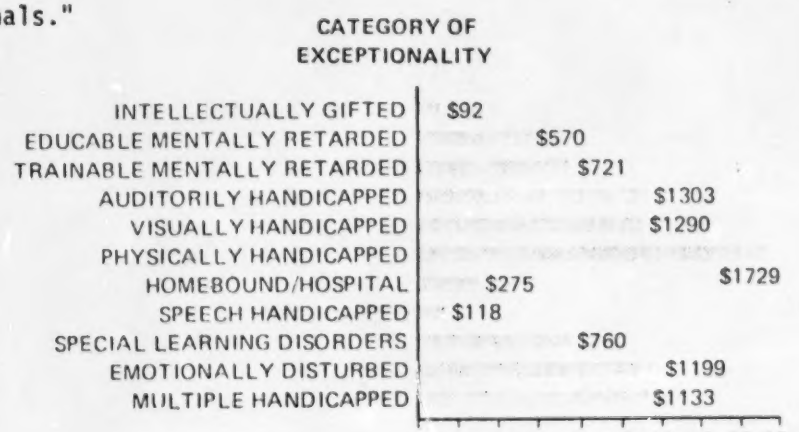

Figure 10-1. Expenditures in 27 Model Districts in Five States (California, Florida, New York, Texas, Wisconsin) with Superior Programs for Children with Exceptional Learning Needs: Excess Beyond Regular Program. (From R. Rossmiller, J. Hale, & L. Frohreich, Educational programs for exceptional children: Resource configurations and costs. Washington, D.C.: National Education Finance Project, 1970, p. 127.)

GT # 9

In 1977 Congress appropriated $2,560,000 to provide for the gifted/talented. If only 1% of the student population were to be considered gifted, $102 could be spent on each. If 5%, only $10 would be available per student, and if 10% - a more reasonable figure - were included, a miserly $5 per student would be available. Of 22 project areas budgeted, only the appropriations for drug abuse education, metric education, and arts in education were lower - but these represent subject areas, NOT groups of students.

Some states fund programs for the gifted/talented. According to the U.S. Office of Education, Office of the Gifted and Talented, the ten top states funding such programs in 1978 appropriated amounts ranging from $15,400,000 to $1, 100, 000. California alone provides almost 3 times as much money for the gifted/talented as the federal government while Idaho spends nearly half as much. A glance at the differences among the amounts per pupil reveals interesting discrepancies.

COMPARISON OF TOP TEN STATE APPROPRIATIONS

State	Amount in Millions	Number of Students Served	Approximate Amount per Student
CA	$ 15.4	190,000	$ 81
PA	13.0	29,000	448
FL	12.0	20,000	600
NC	8.0	39,000	205
GA	4.3	26,000	165
CT	3.0	7,200	417
IL	2.7	78,065	35
MO	1.5	6,026	249
VA	1.4	30,000	47
ID	1.1	1,300	846

That is quite a range - from $35 per student in Illinois to $846 per student in Idaho. Why such an enormous difference? Perhaps because states like Illinois and California, which have had programs longer, need less to maintain them, while states which have more recently awakened to the needs of the gifted/talented require more to establish effective new programs. Perhaps because in more highly populated states, more students need to be reached. Perhaps because programs differ considerably in their natures, therefore in their costs.

Government agencies are not the only sources of money. Businesses and industries, foundations, and local organizations interested in the gifted/talented are also likely contacts for support of gifted child education. But to have your request given even a moment's consideration, a well-thought-out, well-written project proposal must be prepared. This is a time-consuming activity, but the reward is well worth the effort and time if money is forthcoming.

III. Preassessment

PLEASE DO NOT WRITE IN THE MODULE.

1. What do you know about funding a program for gifted child education? By answering the following questions, you will be responding to the question posed just before this statement.
   a. What are you spending now on education per child?
   b. List amounts for each area in which the individual amounts are being spent. Examples: Staff, educational supplies, materials of instruction...
   c. What will the program you have in mind cost, using the same categories as those used in # 1 b?
   d. How much do you think the program will cost per child?

2. Not all programs for the gifted/talented need special funding.
   a. How can physical, personnel, and financial resources be reallocated? What kinds of challenging and worthwhile experiences can be provided with little or no expenditures?
   b. What community resources are available?
   c. How can community resources be incorporated into the school program to provide qualitatively differentiated experiences for the gifted/talented?

3. Assume that you have found no way to arrange for the kind of qualitatively different educational experiences you want your gifted/talented students to have without financial assistance.

a. Describe in writing what you want to do for the gifted/talented.

b. Estimate the amounts of money needed for specific purposes. Put these in writing.

c. List all the possible LOCAL sources for obtaining extra money.

4. Assume that the program you wish to undertake will require more money than could possibly be provided locally.

a. List "outside" sources of money.

b. List the kinds of requirements "outside" moneys entail. (For example, filing deadlines.)

c. Outline the proposal writing process.

Turn to the next page and compare your responses.

GT # 9

PREASSESSMENT EVALUATION

1. a, b, and c (Figures will vary, depending on the wealth of the school district and the nature of the program planned.)

   d

   This, too, is a variable figure depending on how many students are involved, on the kind of program, etc. As T. Ernest Newland comments, "Meaningful bases on which to predict what a program for the gifted might cost are difficult to cite from the literature." (p. 214) Any information is usually given as a ratio comparison with expenditures for other special populations or as 1950 dollar amounts per pupil without specifying the nature of the expenses.

   You may have included any or all of the following to figure costs:

   * special tests to verify potential of particular students
   * teacher training arrangements (consultants, released time...)
   * special instructional equipment and materials, including possible provision of correspondence courses
   * transportation, including special field trips
   * administrative costs, variable depending on the amount of time central office staff and/or principals are involved in planning, initial implementation, and evaluation
   * salaries of one or more extra teachers if class size is smaller than usual as in a class grouped according to ability
   * tuition costs paid by the district if certain students are to attend college sessions part-time or workshops at museums or similar facilities

2. a. The name of this game is ingenuity, or inventiveness. Examples:
   a. Able students in primary grades could go to upper level teachers for instruction in advanced reading, mathematics, science, etc., according to their ability levels and subject strengths.
   b. If there is no money for special art or music teachers, a teacher (or member of the community) gifted in art and one in music could team teach with other teachers.
   c. Instead of hiring paraprofessionals, able students could be invited to serve as assistants to teachers, the office staff (rotated according to various responsibilities),the librar-

ian, or the school nurse for full or part credit. IN EVERY CASE, the duties to be performed by the student should contribute meaningfully to his/her education. In other words, these activities should not be merely menial tasks to keep the gifted busy, but activities which will promote learning about the career of the professional who is the supervisor.

d. Mathematically gifted students should be encouraged to proceed as rapidly from course to course as they can and wish. For example, if a student can complete Algebra 1 in 8 weeks or less, why must he/she spend 180 40+ - minute sessions on the course if they master it in much less time? By progressing through Algebra 2 and even, perhaps, geometry during the same year, they will benefit from their naturally faster rate of learning and can also get on with advanced work earlier through the Advanced Placement program.

e. The gifted/talented can be encouraged to engage in independent study of topics of particular interest during the classes in which they have already mastered the material as demonstrated on pre-tests.

f. The classroom is not and never has been the only or even the main - or, necessarily, the best - place for worthwhile education. Students learn much from their contacts and experiences outside the walls of the school. Capitalize on the most beneficial sources. Invite willing teachers and parents to volunteer to provide minicourses before or after school, on Saturdays, or during the summer without pay.

g. Arrange for volunteer professors or graduate students interested in the gifted/talented to come from near-by colleges or universities to teach special courses.

h. Make arrangements for students to observe or work with businesspersons and professionals in the community with the understanding that these students are to have specific growth-producing responsibilities.

i. Make arrangements for students to serve as volunteers in the community - to the elderly, the handicapped, or to agencies set up to assist special groups. For example, home economics students with special interest and ability in cooking might help in a Meals-on-Wheels program.

j. Others with exceptional ability in languages might read aloud to those who are hospitalized, blind, or elderly, or write letters for them. Students with musical, dramatic, or dancing ability could perform for these same individuals grouped for the occasions. Some students could serve as interpreters.

2. b and c

Responses will vary depending on the size and composition of the community.

3. a and b

Responses will vary. Your description should be specific and your estimate of needed funds realistic.

c. Local sources of money - answers will vary depending on the composition of the community. A partial listing is given as a guide.

(1) Industries

(2) Businesses

(3) Banks

(4) Unions

(5) Kiwanis - Lions Club - Junior Chamber of Commerce

(6) Knights of Columbus - Masons - Elks (and their female counterparts)

(7) Junior League

(8) Business and Professional Women's Association - American Association of University Women

(9) Educational associations

(10) Fraternal chapters (e.g., Phi Delta Kappa)

(11) Parent associations

4. Sources of "outside" moneys

a. Private philanthropical foundations -These produced $3.59 billion in 1975. (Erway and Murphy, p. 12), with education representing the major recipient.(White, 1975, p. 127). There are three types:

(1) General purpose

(2) Corporate (Almost no corporations begin to use the tax write-off funds which they are legally entitled to claim. "In 1970 total corporate contributions to philanthropic causes was slightly more than $797 million, or 1.08 percent of pretax profits " (Council for Financial Aid to Education, Inc.) whereas corporations may legitimately devote 5 per cent to charitable causes (White, 1975, p. 161).

(3) Community

b. Federal government - More than 1000 programs are administered by over 50 different agencies. The popular Title IV C grants administered by the Texas Education Agency represent only one source of moneys for gifted child education. Others are as follows:

(1) National Institute of Education

(2) National Endowment for the Arts

(3) National Endowment for the Humanities

(4) National Science Foundation

(5) U.S. Office of Education (Under the Educational Amendments Act of 1974, education of the gifted/talented can be logically and legitimately funded under a variety of different categories: aid to the disadvantaged, support of bilingual education ("The largest number of unidentified gifted/talented will be found among the poor." Gallegos), provision for women's equity, education of the handicapped...

(6) Office of Human Development (prevention, treatment, and control of juvenile delinquency among the gifted/talented)

b. Requirements

(1) Filing deadlines

(2) Specific guidelines to be followed meticulously

(3) Specific limitations, such as

geographic locations (some foundation grants are limited to a particular state or even community)

subject area or topic (some foundation grants are given only for research in medicine or chemistry or some other specific area of study)

level of education (some grants are restricted to colleges and universities)

amounts of money (although a description may not state such limitations, an examination of grants awarded during a previous year may indicate a range of $6,000 to $5; if your need is for $10,000 or $40,000 application to such a source would be a waste of time and energy)

special recipients (for example, friends or relatives of the foundation trustees who are usually private donors, or specific religious organizations)

(4) Covering letters, applications, multiple copies of project proposals

c. Proposal writing process

Although different agencies and foundations vary in their requirements, certain sections are typical. Some differences may be only in amount of detail. For most proposals the granting agency has set forth guidelines. These should be followed FAITHFULLY. Omission of any section often results in the loss of a significant number of points.

Basic to proposal writing are the following:

(1) Statement of needs or importance of the project (depending on which is specified in the guidelines)

(2) Objectives to be attained as a result of the project

(3) Methods, procedures, or activities designed to achieve objectives

(4) Time involved for each activity

(5) Cost in specific terms: fulltime or part-time employees, supplies, equipment, travel, postage, telephone, etc.

(6) Management plan - individuals responsible for various activities and their qualifications

(7) Evaluation plan

Several books have been written to guide proposal writers. The individual who plans to try outside sources of funding would do well to consult one or more.

School personnel seem to be most interested in Title IV C funds, possibly because these are the only ones they know include the gifted/talented. Three major MISTAKES are typical of a number of schools seeking Title IV C moneys:

MISTAKE # 1

Waiting until three or four days before the deadline to begin (and for some, this means "to begin THINKING about applying"). Writing a successful proposal is NOT like putting together a term paper the night before it is due with a few excerpts from a collection of references.

MISTAKE # 2

Determining the amount of money desired BEFORE having developed a plan. (There seems to be a belief that so much government money is floating around anyone can get it just by asking for it. This may have been true in the late '60s when federal funds were much easier to obtain. It is definitely NOT true now. Competition is keen, and only those who have a specific plan worked out with a budget BASED ON THE PLAN are likely to be considered.

MISTAKE # 3

Ignoring the guidelines or parts of them. (On Title IV C proposals, every item specified has a certain number of points allotted to it. Omitting the information indicated means points are lost. The more omissions, the more lost points, the lower the total score. Often the proposal writer him/herself

puts the school far behind the competition before the proposal ever reaches the Texas Education Agency. For example, in the 1978 round of Title IV C proposals for gifted child education, total points ranged from a low of 13.4 to a high of 53.4 with many in the 40s. Proposals that can garner fewer than 30 points are not worth the time and energy used to type them, not to mention writing them, unless the activity is intended to be merely a learning exercise.

Although these three errors are typical of the proposals sent to TEA, they are undoubtedly true of proposals submitted to other agencies. Writers of some of the books about grantsmanship point out another controllable but common mistake made by writers of proposals sent to foundations: ignoring the interests of the foundations. If the foundation specifies that it is concerned only with public libraries or accepts applications only from the Catholic Church, there is no point in sending a proposal to establish a Learning Resource Center for the gifted/talented in a public elementary school or a Lutheran primary school.

Now, to be more positive - the proposal writing process should include the following:

a. Needs assessment

If your staff have already searched all the records and screened the students for various kinds of giftedness, and if the school or district has no provisions or only the limited and ambiguous provision of "enrichment" (See Module 5 in this series.), you probably have the figures and facts required for this section. BUT CHECK THE GUIDELINES TO BE SURE. (A copy of the Guidelines for Title IV C is available from TEA.) Relating your needs to national and state priorities and/or legislative mandate is a good way to begin if applicable. Your target groups should be identified and justified (for example, why start with a math-science group in 7th/8th grade, or language arts with kindergartners, first-graders, and second-graders?). A knowledge of what has been done or is being done, similar to what you wish to undertake,should be reflected, representing research in a variety of sources - ERIC indexes, THE EDUCATION INDEX, appropriate books, monographs, dissertations, etc.

If you are applying for funds from USOE agencies (it is possible

to obtain funds from two or more different agencies), the needs assessment data required is much more extensive. Demographic information - including the geographic location of the community, its ethnic populations, the socioeconomic distribution, as well as additional details about the school/district - is necessary.

b. Objectives

Obviously, objectives must be closely related to stated problems and needs. These must be presented in specific, measurable terms so that their attainment can be determined. (Robert Mager is frequently referred to as the author of an easy-to-follow reference on writing such objectives: PREPARING INSTRUCTIONAL OBJECTIVES.)

Action verbs like the following define measurable objectives -

design	explain	describe
contrast	analyze	conduct
predict	modify	distinguish
interact	report	isolate

- whereas these more general verbs are vague and should be avoided:

understand	know	appreciate
attempt	learn	develop

Each objective should also indicate the time of completion and the means by which attainment will be determined.

c. Activities

Procedures or activities must be closely tied to both the stated needs and specific objectives. All activities should be "programatically realistic and effective" and also "economically feasible" and should reflect awareness of what has been done elsewhere that can be adopted or adapted to the local situation. A timeline should be provided indicating definite time spans for given activities with beginning and completion dates clearly shown.

d. Resource management

Procedures for managing the project should be spelled out. Who will administer the project if funded and coordinate the activities? What are the qualifications of staff members who will be involved whether these are individuals already on the payroll or newcomers to be recruited? What are their responsibilities? Will outside consultants be needed? If so, where will they come from, how long will they be needed, what will they do, and how will they be reimbursed for their

assistance?

A reasonably detailed budget is required with amounts specified for both full-time and part-time personnel and their fringe benefits, along with amounts for supplies, telephone, postage, staff travel, and other items essential to implementation of the program, including purchased and contracted services and needed equipment.

e. Evaluation

Plans need to be described to measure the attainment of each objective. Procedures must be spelled out for collection and analysis of data. Designs are recommended - where appropriate - for both formative (developmental) and summative (final) approaches, as well as process (on-going) and product (completed documents, such as curriculum guides, LAPs, reports). This section tends to to be slighted most frequently by proposal developers. It has counted 6 points in past Title IV C ratings. Ignoring it - as some writers have done - immediately dropped the total points possible to the 40s. A point lost here, another there, add up. (The 1978 Guidelines for Title IV C proposals included the number of points allotted each part, thus enabling the proposal writer to make a quick self-estimate of possible total points.)

f. Dissemination and Replicability

In another part of Title IV C proposals, details must be supplied regarding dissemination of information to the school and community with documentation of developments and results of evaluation for anyone interested in replicating the project.

With so much at stake, it is folly to "dash off" a proposal in the hope that somehow it will be one of the finalists. Good proposals take TIME and thoughtful preparation. They are reviewed and rated by selected individuals with experience and expertise in the areas addressed, as well as by Agency personnel.

Because the writing of successful proposals is time-consuming, it is suggested that a committee work on the development of different parts with one of the members responsible for the final writing to make certain that all required information has been given and that the material is logically

and clearly presented in simple, straightforward English. In addition, it is recommended that knowledgeable others critique the proposal and that the writer revise it accordingly.

Good proposals - those worthy of being funded - do not result from last-minute spur-of-the-moment ideas or efforts. One can understand why school personnel are reluctant to become involved in this time-consuming activity; yet if it is the only way to finance a program for the gifted/talented and if a grant is received, the time is well-spent. Following the guidelines explicitly and providing substantiating data contribute much to the effectiveness of the effort.

Programs for the gifted/talented can qualify in any of a dozen or more categories if they are slanted toward that target group. For example:

Title 1 (disadvantaged)	Career Education
Bilingual Education	Women's Educational Equity
Environmental Education	Arts in Education
Ethnic Heritage Studies	Educational TV Programing
Handicapped Education	Libraries and Instructional Resources

A word to the wise

In order to make the proposal as easy as possible for the reviewer to read and to spot the information required, the use of KEY WORDS as headings is wise. Major section headings will be centered with the key words in full capitals like this example:

NEEDS ASSESSMENT

Sections may also be numbered or lettered like the guidelines so the reader is always certain that the guidelines are being followed.

Sub-section headings will begin flush with the margin, and the key word(s) will appear in both upper and lower case with the whole phrase underlined as

follows:

National Priority
or
State Priority
or
Local Need

depending on the subject being discussed.

A table of contents is another helpful aid to the reader, as are samples of questionnaires, letters from parents or other representatives of the community, copies of state laws or appropriate parts of national laws, and other kinds of documentation for claims. These items should be submitted as an appendix for those readers who may wish to verify statements. The appendix should not, however, be loaded with miscellaneous material that has slight relevance to the proposal.

Elaborate covers and divider sheets do not add points, impressive as they may be. Some foundations and Agencies specify that proposals NOT have these. A FIRM BINDING of all papers is a must, however. Poorly stapled proposals that fall apart as they are being read aggravate a reader and may cause him/her to be subconsciously supercritical in evaluating the information provided. If a proposal is thick, a plastic spiral binding should be considered.

Funding agencies do not operate on the basis of a biblical philosophy, "Ask and ye shall receive." They are hard-nosed about who receives the moneys entrusted to them. Their philosophy is closer to "Prove your need and capabilities of meeting stated obligations." Even then, you must be prepared to negotiate the amount of money requested. "You say you need $30,000? We can't manage that much. We can supply only $22,000." Or -

"Cut your costs by 18%." So back you must go to scrutinize your projected budget, your objectives, your intended activities, and you must decide where you can reduce amounts while at the same time determining what such reductions will do to your overall program. Do you really need ten days of consultant time, or will five do? Is there another way of accomplishing what you expected from the consultants, a way that requires little or no expenditure? (For example, consultants from your local regional Education Service Center; use of this series of worktexts, STAR POWER, with your faculty...) Sometimes it is possible to pare 18% (or whatever the figure is) off each item of the budget without seriously impairing any part of the program and anticipated achievements.

Seeking funds from outside agencies is not for the faint-hearted, the weak, the procrastinator, the bluffer.

THINK - before you seek.

IV. Activities

1. Approach the local sources listed in the Preassessment, Number 3 c, page 86 . Describe your plan and the money needed. Show how the community as well as the individual students will benefit from investment in special educational provisions for the gifted/talented. (Refer to the rationale you prepared for Step One, Preassessment, page 7,in the module.)
2. Write a proposal for the program you wish to offer the gifted/talented students in your school/district. Include all the kinds of information indicated in the guidelines, and use the various reader aids described on pages 93 and 94.

   Have your proposal reviewed and critiqued by at least 3 knowledgeable colleagues.

   Revise the proposal if the criticisms and suggestions are valid and appropriate.

Postassessment

NOTE: The postassessment for this module is to have completed a project proposal for a program for the gifted/talented in your school/district which has the potential for acceptance.
If you have not yet done this, you should write one now.

In addition, review each of the following pages listing objectives for this module (1, 14, 28, 60, 78) and rate yourself on a 1 to 5 scale, 5 being high. If you cannot honestly claim a 4 or better, recycle through those parts of the module which you seem to need.

GT # 9

Resources

Affective Education in Philadelphia. Norman A. Newberg. Bloomington,IN: Phi Delta Kappa Educational Foundation, 1977.

Classroom Cue Cards for Cultivating Multiple Talent. Bob Eberle. Buffalo, NY: D.O.K. Publishers, Inc., 1974.

Community Involvement for Classroom Teachers. Donna L. Hager and Others. Charlottesville, VA: Community Collaborators, 1977.

DEVELOPING A WRITTEN PLAN FOR THE EDUCATION OF GIFTED AND TALENTED STUDENTS. Irving Sato, Martin Birnbaum, and Jane Early LoCicero. Ventura,CA: National/State Leadership Training Institute, 1974.

Getting It All Together: Confluent Education. George Isaac Brown, Mark Phillips, and Stewart Bennett Shapiro. Bloomington, IN: The Phi Delta Kappa Educational Foundation, 1976.

A GUIDE TOWARD BETTER TEACHING FOR THE GIFTED. Ruth A. Martinson. Ventura, CA: National/State Leadership Training Institute, 1976.

A GUIDEBOOK FOR EVALUATING PROGRAMS FOR THE GIFTED/TALENTED. Joseph S. Renzulli. Ventura, CA: National/State Leadership Training Institute, 1975.

IDEAS FOR URBAN/RURAL GIFTED AND TALENTED. Ventura, CA: National/State Leadership Training Institute, 1975.

IDENTIFICATION OF THE GIFTED AND TALENTED. Ruth A. Martinson. Reston,VA: Council for Exceptional Children, 1975.

PROVIDING PROGRAMS FOR THE GIFTED AND TALENTED. Sandra Kaplan. Reston, VA: The Council for Exceptional Children, 1975.

TRAINING TEACHERS FOR THE GIFTED AND TALENTED: A Comparison of Models. C. June Maker. Reston, VA: The Council for Exceptional Children, 1975.

Bibliography of Works Cited

Bishop, W. "Successful Teachers of the Gifted." Exceptional Children, 1968, 34, p. 48.

Braga, Joseph. "Early Admission: Opinion Versus Evidence. Elementary School Journal, October, 1971. pp. 35-46.

Conant, James B. THE AMERICAN HIGH SCHOOL TODAY. New York: McGraw-Hill, 1959.

DeHaan, Robert F. and Robert J. Havighurst. EDUCATING GIFTED CHILDREN, Revised and Enlarged Edition. Chicago: University of Chicago Press, 1957, 1961.

Doob, Heather. GIFTED STUDENTS: IDENTIFICATION TECHNIQUES AND PROGRAM ORGANIZATION. ERS Information Aid. Arlington, VA: Educational Research Service, 1975.

Drews, Elizabeth Monroe. "Beyond Curriculum." Journal of Humanistic Psychology, Vol. 8 (1968), pp. 97-112.

Gallagher, James J. TEACHING THE GIFTED CHILD, Second Edition. Boston: Allyn and Bacon, Inc., 1964, 1975.

Gold, Milton J. EDUCATION OF THE INTELLECTUALLY GIFTED. Columbus,OH: Charles E. Merrill Books, Inc., 1965.

Gowan, John Curtis and E. Paul Torrance. EDUCATING THE ABLEST. Itasca, IL: F.E. Peacock Publishers, Inc., 1971.

Hersey, John. THE CHILD BUYER. NY: Alfred Knopf, 1960.

Hollingworth, Leta S. CHILDREN ABOVE 180 I.Q. New York: World Book Co., 1942.

Impellizeri, Anne, Marjory J. Farrell, and William G. Melville. "Psychological and Emotional Needs of Gifted Youngsters." NAASP Bulletin, March 1976, pp. 43-48.

Kaplan,Sandra. PROVIDING PROGRAMS FOR THE GIFTED AND TALENTED: A HANDBOOK. Reston, VA: The Council for Exceptional Children, 1975.

Kirk, Samuel A. "The Intellectually Gifted Child." EDUCATING EXCEPTIONAL CHILDREN, Second Edition. Boston: Houghton Mifflin, 1962, 1972.

Martinson, Ruth A. "The Gifted and Talented: Whose Responsibility?" Principal, February 1972, pp. 46-49.

Lyon, Harold C. "A New Federal Priority." Today's Education, January-February 1976, pp. 33-35.

Newland, T. Ernest. THE GIFTED IN SOCIOEDUCATIONAL PERSPECTIVE. Englewood Cliffs, NJ: Prentice-Hall, Inc., 1976.

Nissen, Myra H. "Flight from Mediocrity." Principal, February, 1972, pp. 81-87.

Olson, Thomas. "Raising Consciousness of Key Publics about the Needs of the Gifted and Talented. Ventura, CA: National and State Leadership Training Institute on Gifted and Talented, 1975.

Passow, A. Harry."The Gifted and the Disadvantaged." Principal, February 1972, pp. 24-27.

Ray, Julie. TURNING ON BRIGHT MINDS: A Parent Looks at Gifted Education in Texas. Houston, TX: Prologues, 1977.

Syphers, Dorothy. GIFTED AND TALENTED CHILDREN: Practical Programming for Teachers and Principals. Arlington, VA: The Council for Exceptional Children, 1972.

Taba, Hilda. "Learning by Discovery. Psychological and Educational Rationale." Elementary School Journal, 1963, 63, pp. 308-316.

Tannenbaum, Abraham. "A Backward and Forward Glance at the Gifted." Principal, 1972, pp. 14-23.

Taylor, Calvin W. "Cultivating New Talents: A Way to Reach the Educationally Deprived." The Journal of Creative Behavior, 1968, 2, pp. 83-90.

Tomasson, Verna. "Giften Children in a Bind." The Nation.

Ward, Virgil S. EDUCATING THE GIFTED. Columbus, OH: Charles E. Merrill Books, Inc., 1961.

--- "The Gifted Student: A Manual for Program Improvement. A Report to the Southern Regional Project for Education of the Gifted." Atlanta: Southern Regional Project for Education of the Gifted, 1962.

Wolf, Mary Hunter, Irving S. Sato,Barbara Johnson, and David M. Jackson. NASSP Bulletin, March 1976, pp. 20-27.

ABOUT THE DEVELOPERS OF THE PROGRAM...

Nancy Alexander (B.A. in both English and history with a minor in art; M.A. in special education; working on Ph.D. in education of the exceptional child). Ms. Alexander taught sophomore English in Texas, arts and crafts and a class of handicapped adolescents at Oceana High School in California, and has worked with exceptional children at the Brown School in Austin, Texas.

Elizabeth Duke (B.A. in English and Spanish; M.A. in English) Ms. Duke was a teaching assistant in English at North Texas State University in Denton, taught language arts and reading at the secondary level in Illinois, and was a part-time teacher of composition at Austin Community College in Austin, Texas. She is the parent of a teenage son and a teenage daughter.

Sharlene Gilman (B.A. with honors in psychology, minor in radio/television/film) Ms. Gilman was the winner of a four-year Moody Foundation Scholarship Award. She taught a class in creative writing at Antioch-Juarez Lincoln in Austin, Texas.

Alison Heinemann (B.A. with honors in Liberal Arts; M.A. and Ph.D. in English) Ms. Heinemann was an instructor in the Department of English at the State University of New York, Stony Brook. She is now a freelance writer and editor and the parent of a daughter.

Jackie Mallis (B.A. with honors in English; M.A. in Education) Mrs. Mallis worked with gifted teenagers in both heterogeneous and homogeneous English classes in New York State, Hawaii, Arizona, and California. She also taught elective courses which attracted gifted students: Latin, speech, journalism, and creative writing. Mrs. Mallis was a senior editor at a division of McGraw-Hill and later a freelance writer for several leading publishers of educational materials. She is the parent of two sons, one of whom was a National Merit Finalist.